WEST Search History

Hide Items	Restore*	Clear	Cancel
------------	----------	-------	--------

DATE: Thursday, April 07, 2005

Hide?	Set Name	Query	Hit Count
	DB=PGPE	B, USPT, USOC, EPAB, JPAB, DWPI; PLUR=YE	ES; OP=ADJ
	L11	sodium-calcium exchanger	45
	L10	L9 AND sodium-calcium exchanger	3
	L9	536/23.5.CCLS.	9570
	L8	L7 AND sodium-calcium exchanger	6
	L7	435/325.CCLS.	17398
	L6	Hilbun.IN.	82
	L5	Hilbun-E.IN.	31
	L4	Hilbun-Erin.IN.	45
	L3	Friddle.IN.	127
	L2	Friddle-C.IN.	0
	L1	(Friddle-Carl.IN.)	0

END OF SEARCH HISTORY

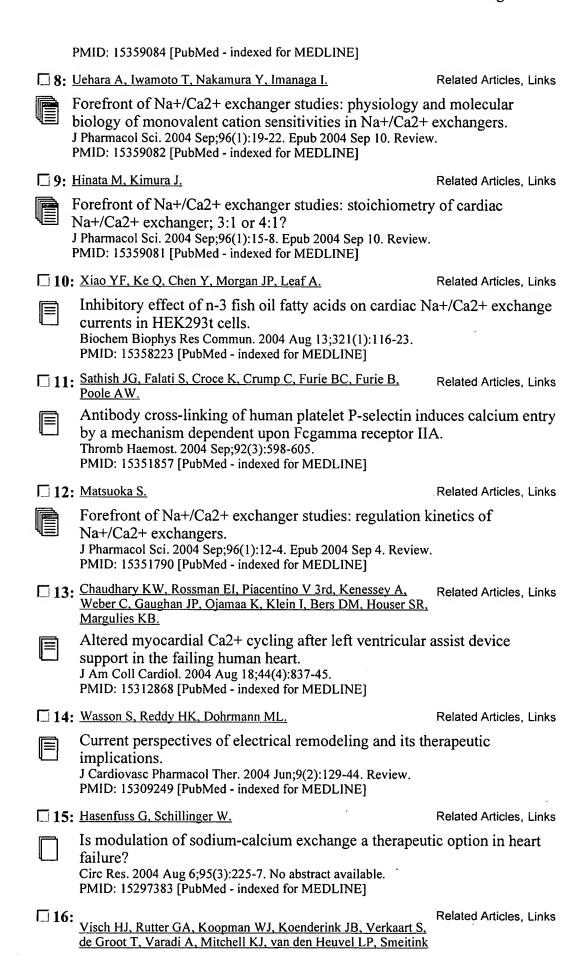








All Databases	PubMed	Nucleotide	Protein	Genome	Structure	OMIM	PMC	Journals	Bool
Search PubMed		for hur	nan sodiur	n-calcium ex	changer		Go	Clear Sav	e Sea
	Limit	s Preview	/Index	History (Clipboard ~	Details	`		
	Did y	ou mean: <u>hur</u>	nan <mark>sodiu</mark>	m calcium	exchange (769 item	s)		
About Entrez		la .				iron I a		- T	
Text Version	Displa	Summary		Show 50	U Sort by	/ <u> </u>	end to	2	
Entrez PubMed	All:	428 Review:	129 强						
Overview	Items	1 - 428 of 42	8					One	page.
Help FAQ Tutorial	□1:	Xie X, Wu G,	Lu ZH, Rol	howsky-Koch	an C, Ledeen	RW.	Relat	ted Articles,	Links
New/Noteworthy E-Utilities		Presence of envelope of	non-neur	al cells: nati	are of excha				
PubMed Services Journals Database		Neurochem Re PMID: 156628							
MeSH Database Single Citation Matcher	□ 2:	Aneiros E, Phi	ilipp S, Lis	A, Freichel M	, Cavalie A.		Rela	ted Articles,	Links
Batch Citation Matcher Clinical Queries LinkOut My NCBI (Cubby)		Modulation J Immunol. 20 PMID: 156112	05 Jan 1;17	4(1):119-30.		_	ers in m	nast cells.	
Related Resources	□3:	Uemura N, Ol M, Matsuzaki	ikusa T, Ha M, Mochiz	mano K, Naka uki S, Minami	igome M, Hoi sawa S, Ishik	ri H, Shim awa Y.	i <u>zu</u> Rela	ted Articles,	Links
Order Documents NLM Catalog NLM Gateway TOXNET Consumer Health Clinical Alerts		Down-regul fibrillation. Eur J Clin Inv PMID: 15530	est. 2004 N	ov;34(11):723	-30.		chronic	atrial	
ClinicalTrials.gov	□4:	Zhang S, Yuar	ı JX, Barret	t KE, Dong H	<u>•</u>		Rela	ted Articles,	Links
PubMed Central		Role of Nathuman pulm Am J Physiol PMID: 15456	nonary art Cell Physio	ery smooth l. 2005 Feb;28	muscle cell 88(2):C245-52	s. 2. Epub 20			
	□ 5:	Ke YS, Wang	HG, Wang	DG, Zhang G	<u>B.</u>		Rela	ted Articles,	Links
		Endoxin-me Can J Physiol PMID: 153819	Pharmacol.	2004 Jun;82(6):402-8.		njury in	rats in vi	tro.
	□6:	Bracken NK,	Woodall AJ	, Howarth FC	, Singh J.		Rela	ted Articles,	Links
		Voltage-der myocytes. Mol Cell Bioc PMID: 15362	hem. 2004 .	Jun;261(1-2):2	235-43.		induced	l diabetic	
	□7:	Iwamoto T.					Rela	ted Articles,	Links
		Forefront of Na+/Ca2+ e J Pharmacol S	xchange	inhibitors.			•	cology of	•



JA, Willems PH. Inhibition of mitochondrial Na+-Ca2+ exchange restores agonist-induced ATP production and Ca2+ handling in human complex I deficiency. J Biol Chem. 2004 Sep 24;279(39):40328-36. Epub 2004 Jul 21. PMID: 15269216 [PubMed - indexed for MEDLINE] ☐ 17: Gabellini N. Related Articles, Links Transcriptional regulation by cAMP and Ca2+ links the Na+/Ca2+ exchanger 3 to memory and sensory pathways. Mol Neurobiol. 2004 Aug;30(1):91-116. Review. PMID: 15247490 [PubMed - indexed for MEDLINE] 18: Cheung JY, Song J, Rothblum LI, Zhang XQ. Related Articles, Links Exercise training improves cardiac function postinfarction: special emphasis on recent controversies on na+/ca2+ exchanger. Exerc Sport Sci Rev. 2004 Jul;32(3):83-9. Review. PMID: 15243202 [PubMed - indexed for MEDLINE] 19: Hobai IA, Maack C, O'Rourke B. Related Articles, Links Partial inhibition of sodium/calcium exchange restores cellular calcium handling in canine heart failure. Circ Res. 2004 Aug 6;95(3):292-9. Epub 2004 Jun 24. PMID: 15217911 [PubMed - indexed for MEDLINE] □ 20: Akabas MH. Related Articles, Links Na+/Ca2+ exchange inhibitors: potential drugs to mitigate the severity of ischemic injury. Mol Pharmacol. 2004 Jul;66(1):8-10. No abstract available. PMID: 15213290 [PubMed - indexed for MEDLINE] 21: Kiedrowski L, Czyz A, Baranauskas G, Li XF, Lytton J. Related Articles, Links Differential contribution of plasmalemmal Na/Ca exchange isoforms to sodium-dependent calcium influx and NMDA excitotoxicity in depolarized neurons. J Neurochem. 2004 Jul;90(1):117-28. PMID: 15198672 [PubMed - indexed for MEDLINE] 22: Kinjo TG, Szerencsei RT, Winkfein RJ, Schnetkamp PP. Related Articles, Links Role of cysteine residues in the NCKX2 Na+/Ca(2+)-K+ Exchanger: generation of a functional cysteine-free exchanger. Biochemistry. 2004 Jun 22;43(24):7940-7. PMID: 15196038 [PubMed - indexed for MEDLINE] 23: Mohler PJ, Splawski I, Napolitano C, Bottelli G, Sharpe L, Related Articles, Links Timothy K, Priori SG, Keating MT, Bennett V. A cardiac arrhythmia syndrome caused by loss of ankyrin-B function. Proc Natl Acad Sci U S A. 2004 Jun 15;101(24):9137-42. Epub 2004 Jun 3. PMID: 15178757 [PubMed - indexed for MEDLINE]

The potential of Na+/Ca2+ exchange blockers in the treatment of cardiac

Expert Opin Investig Drugs. 2004 Jun;13(6):653-64. Review. PMID: 15174951 [PubMed - indexed for MEDLINE]

-http://www.ncbi-nlm-nih-gov/entrez/query-fcgi?GMD=search&DB=pubmed—

24: Hobai IA, O'Rourke B.

disease.

----4/7/2005-----

Related Articles, Links

□ 25:	Bolck B, Munch G, Mackenstein P, Hellmich M, Hirsch I, Reuter H, Hattebuhr N, Weig HJ, Ungerer M, Brixius K, Schwinger RH.	Related Articles, Links
	Na+/Ca2+ exchanger overexpression impairs frequenc dependent cell shortening in adult rat cardiomyocytes. Am J Physiol Heart Circ Physiol. 2004 Oct;287(4):H1435-45. Ep PMID: 15165985 [PubMed - indexed for MEDLINE]	y- and ouabain-
□ 26:	Tintinger GR, Anderson R.	Related Articles, Links
	Counteracting effects of NADPH oxidase and the Na+on membrane repolarisation and store-operated uptake chemoattractant-activated human neutrophils. Biochem Pharmacol. 2004 Jun 15;67(12):2263-71. PMID: 15163557 [PubMed - indexed for MEDLINE]	
□ 27:	Chernysh O, Condrescu M, Reeves JP.	Related Articles, Links
	Calcium-dependent regulation of calcium efflux by the sodium/calcium exchanger. Am J Physiol Cell Physiol. 2004 Sep;287(3):C797-806. Epub 200 PMID: 15151903 [PubMed - indexed for MEDLINE]	
□ 28:	Craner MJ, Newcombe J, Black JA, Hartle C, Cuzner ML, Waxman SG.	Related Articles, Links
	Molecular changes in neurons in multiple sclerosis: altexpression of Nav1.2 and Nav1.6 sodium channels and exchanger. Proc Natl Acad Sci U S A. 2004 May 25;101(21):8168-73. Epub PMID: 15148385 [PubMed - indexed for MEDLINE]	l Na+/Ca2+
□ 29:	Iwamoto T, Kita S.	Related Articles, Links
	Development and application of Na+/Ca2+ exchange i Mol Cell Biochem. 2004 Apr;259(1-2):157-61. Review. PMID: 15124919 [PubMed - indexed for MEDLINE]	nhibitors.
□ 30:	El-Armouche A, Jaeckel E, Boheler KR, Boknik P, Hertle B, Neumann J, Eschenhagen T.	Related Articles, Links
	Ouabain treatment is associated with upregulation of p inhibitor-1 and Na+/Ca(2+)-exchanger and beta-adrene in rat hearts. Biochem Biophys Res Commun. 2004 May 21;318(1):219-26. PMID: 15110776 [PubMed - indexed for MEDLINE]	
□31:	von Lewinski D, Stumme B, Fialka F, Luers C, Pieske B.	Related Articles, Links
	Englished releases a Calculate to the Color	
	Functional relevance of the stretch-dependent slow for failing human myocardium. Circ Res. 2004 May 28;94(10):1392-8. Epub 2004 Apr 22. PMID: 15105296 [PubMed - indexed for MEDLINE]	ce response in
□ 32:	failing human myocardium. Circ Res. 2004 May 28;94(10):1392-8. Epub 2004 Apr 22.	ce response in Related Articles, Links
□ 32:	failing human myocardium. Circ Res. 2004 May 28;94(10):1392-8. Epub 2004 Apr 22. PMID: 15105296 [PubMed - indexed for MEDLINE]	Related Articles, Links

	Real-time RT-PCR for gene expression profiling in blo patients-a pilot study: gene expression in blood of hear Basic Res Cardiol. 2004 May;99(3):230-8. Epub 2004 Feb 19. PMID: 15088108 [PubMed - indexed for MEDLINE]	
□34:	Palty R, Ohana E, Hershfinkel M, Volokita M, Elgazar V, Beharier O, Silverman WF, Argaman M, Sekler I.	Related Articles, Links
	Lithium-calcium exchange is mediated by a distinct po independent sodium-calcium exchanger. J Biol Chem. 2004 Jun 11;279(24):25234-40. Epub 2004 Apr 1. PMID: 15060069 [PubMed - indexed for MEDLINE]	tassium-
□ 35:	Osborne NN, Wood JP, Chidlow G, Casson R, DeSantis L, Schmidt KG.	Related Articles, Links
	Effectiveness of levobetaxolol and timolol at blunting related to their calcium and sodium blocking activities: glaucoma. Brain Res Bull. 2004 Feb 15;62(6):525-8. Review. PMID: 15036567 [PubMed - indexed for MEDLINE]	
□36:	Diaz-Horta O, Van Eylen F, Herchuelz A.	Related Articles, Links
	Na/Ca exchanger overexpression induces endoplasmic caspase-12 release, and apoptosis. Ann N Y Acad Sci. 2003 Dec;1010:430-2. PMID: 15033764 [PubMed - indexed for MEDLINE]	reticulum stress,
□ 37:	Hegde M, Roscoe J, Cala P, Gorin F.	Related Articles, Links
	Amiloride kills malignant glioma cells independent of sodium-hydrogen exchanger. J Pharmacol Exp Ther. 2004 Jul;310(1):67-74. Epub 2004 Mar 9. PMID: 15010500 [PubMed - indexed for MEDLINE]	its inhibition of the
□ 38:	Roberts DE, McNicol A, Bose R.	Related Articles, Links
	Mechanism of collagen activation in human platelets. J Biol Chem. 2004 May 7;279(19):19421-30. Epub 2004 Feb 23. PMID: 14981087 [PubMed - indexed for MEDLINE]	
□ 39:	Yasumura Y, Takemura K, Sakamoto A, Kitakaze M, Miyatake K.	Related Articles, Links
	Changes in myocardial gene expression associated with therapy in patients with chronic heart failure. J Card Fail. 2003 Dec;9(6):469-74. PMID: 14966788 [PubMed - indexed for MEDLINE]	n beta-blocker
□ 40:	Schnetkamp PP.	Related Articles, Links
	The SLC24 Na+/Ca2+-K+ exchanger family: vision an Pflugers Arch. 2004 Feb;447(5):683-8. Epub 2003 May 6. Review PMID: 14770312 [PubMed - indexed for MEDLINE]	
□41:	Seemann G, Sachse FB, Weiss DL, Dossel O.	Related Articles, Links
	Quantitative reconstruction of cardiac electromechanics myocardium: regional heterogeneity. J Cardiovasc Electrophysiol. 2003 Oct;14(10 Suppl):S219-28. PMID: 14760927 [PubMed - indexed for MEDLINE]	s in human
	Varro A, Biliczki P, Iost N, Virag L, Hala O, Kovacs P, Matyus	

□ 42:	P, Papp JG.	Related Articles, Links
	Theoretical possibilities for the development of novel a drugs.	nntiarrhythmic
	Curr Med Chem. 2004 Jan;11(1):1-11. Review. PMID: 14754422 [PubMed - indexed for MEDLINE]	
□ 43:	Ikeda M, Nagashima T, Bhattacharjee AK, Kondoh T, Kohmura E, Tamaki N.	Related Articles, Links
	Quantitative analysis of hyperosmotic and hypothermic barrier opening. Acta Neurochir Suppl. 2003;86:559-63. PMID: 14753506 [PubMed - indexed for MEDLINE]	blood-brain
□ 44:	Rosker C, Graziani A, Lukas M, Eder P, Zhu MX, Romanin C, Groschner K.	Related Articles, Links
	Ca(2+) signaling by TRPC3 involves Na(+) entry and I the Na(+)/Ca(2+) exchanger. J Biol Chem. 2004 Apr 2;279(14):13696-704. Epub 2004 Jan 21. PMID: 14736881 [PubMed - indexed for MEDLINE]	ocal coupling to
□ 45:	Sato M, Gong H, Terracciano CM, Ranu H, Harding SE.	Related Articles, Links
	Loss of beta-adrenoceptor response in myocytes overex Na+/Ca(2+)-exchanger. J Mol Cell Cardiol. 2004 Jan;36(1):43-8. PMID: 14734046 [PubMed - indexed for MEDLINE]	xpressing the
□ 46:	Xiao RP, Balke CW.	Related Articles, Links
	Na+/Ca2+ exchange linking beta2-adrenergic G(i) sign failure: associated defect of adrenergic contractile supp J Mol Cell Cardiol. 2004 Jan;36(1):7-11. No abstract available. PMID: 14734040 [PubMed - indexed for MEDLINE]	•
□ 47:	Ogura J, Mitamura M, Someya A, Shimamura K, Takayama H, Aimi N, Horie S, Murayama T.	Related Articles, Links
	Mesaconitine-induced relaxation in rat aorta: role of Na exchangers in endothelial cells. Eur J Pharmacol. 2004 Jan 12;483(2-3):139-46. PMID: 14729101 [PubMed - indexed for MEDLINE]	a+/Ca2+
□ 48:	Amran MS, Homma N, Hashimoto K.	Related Articles, Links
	Pharmacology of KB-R7943: a Na+-Ca2+ exchange in Cardiovasc Drug Rev. 2003 Winter;21(4):255-76. Review. PMID: 14647531 [PubMed - indexed for MEDLINE]	hibitor.
□ 49:	Cai X, Lytton J.	Related Articles, Links
	Molecular cloning of a sixth member of the K+-dependence exchanger gene family, NCKX6. J Biol Chem. 2004 Feb 13;279(7):5867-76. Epub 2003 Nov 18. PMID: 14625281 [PubMed - indexed for MEDLINE]	lent Na+/Ca2+
□ 50:	Rizzuto R.	Related Articles, Links
	Calcium mobilization from mitochondria in synaptic tra J Cell Biol. 2003 Nov 10;163(3):441-3. Review.	ansmitter release.

□ **51**: Hill JA. Related Articles, Links Electrical remodeling in cardiac hypertrophy. Trends Cardiovasc Med. 2003 Nov;13(8):316-22. Review. PMID: 14596946 [PubMed - indexed for MEDLINE] ☐ **52:** Reeves JP, Condrescu M. Related Articles, Links Allosteric activation of sodium-calcium exchange activity by calcium: persistence at low calcium concentrations. J Gen Physiol. 2003 Nov;122(5):621-39. PMID: 14581586 [PubMed - indexed for MEDLINE] 53: Ohana E, Segal D, Palty R, Ton-That D, Moran A, Sensi SL, Related Articles, Links Weiss JH, Hershfinkel M, Sekler I. A sodium zinc exchange mechanism is mediating extrusion of zinc in mammalian cells. J Biol Chem. 2004 Feb 6;279(6):4278-84. Epub 2003 Oct 27. PMID: 14581475 [PubMed - indexed for MEDLINE] ☐ 54: Khan SA, Hare JM. Related Articles, Links The role of nitric oxide in the physiological regulation of Ca2+ cycling. Curr Opin Drug Discov Devel. 2003 Sep;6(5):658-66. Review. PMID: 14579515 [PubMed - indexed for MEDLINE] 55: Weber CR, Piacentino V 3rd, Houser SR, Bers DM. Related Articles, Links Dynamic regulation of sodium/calcium exchange function in human heart failure. Circulation. 2003 Nov 4;108(18):2224-9. Epub 2003 Oct 13. PMID: 14557358 [PubMed - indexed for MEDLINE] 56: Sergeeva OA, Amberger BT, Eriksson KS, Scherer A, Haas HL. Related Articles, Links Co-ordinated expression of 5-HT2C receptors with the NCX1 Na+/Ca2+ exchanger in histaminergic neurones. J Neurochem. 2003 Nov;87(3):657-64. PMID: 14535948 [PubMed - indexed for MEDLINE] 57: Bers DM, Eisner DA, Valdivia HH. Related Articles, Links Sarcoplasmic reticulum Ca2+ and heart failure: roles of diastolic leak and Ca2+ transport. Circ Res. 2003 Sep 19;93(6):487-90. No abstract available. PMID: 14500331 [PubMed - indexed for MEDLINE] 58: Bernecker OY, del Monte F, Hajjar RJ. Related Articles, Links Gene therapy for the treatment of heart failure--calcium signaling. Semin Thorac Cardiovasc Surg. 2003 Jul;15(3):268-76. Review. PMID: 12973704 [PubMed - indexed for MEDLINE] 59: Malli R, Frieden M, Osibow K, Zoratti C, Mayer M, Demaurex Related Articles, Links Sustained Ca2+ transfer across mitochondria is Essential for mitochondrial Ca2+ buffering, sore-operated Ca2+ entry, and Ca2+ store J Biol Chem. 2003 Nov 7;278(45):44769-79. Epub 2003 Aug 26. PMID: 12941956 [PubMed - indexed for MEDLINE] Schuh K, Quaschning T, Knauer S, Hu K, Kocak S, Roethlein N, Related Articles, Links

□ 60:	Neyses L.	
	Regulation of vascular tone in animals overexpressing calcium pump. J Biol Chem. 2003 Oct 17;278(42):41246-52. Epub 2003 Aug 4. PMID: 12900399 [PubMed - indexed for MEDLINE]	the sarcolemmal
□61:	Kang K, Schnetkamp PP.	Related Articles, Links
	Signal sequence cleavage and plasma membrane target rod NCKX1 and cone NCKX2 Na+/Ca2+ - K+ exchan Biochemistry. 2003 Aug 12;42(31):9438-45. PMID: 12899631 [PubMed - indexed for MEDLINE]	
□ 62:	Gupta A, Gupta S, Tiwary AK.	Related Articles, Links
	Spermicidal efficacy of H2-receptor antagonists and pod'-dichlorobenzamil hydrochloride: role of intrasperm Contraception. 2003 Jul;68(1):61-4. PMID: 12878289 [PubMed - indexed for MEDLINE]	
□ 63:	Kiang JG, McClain DE, Warke VG, Krishnan S, Tsokos GC.	Related Articles, Links
	Constitutive NO synthase regulates the Na+/Ca2+ exchange cells: role of [Ca2+]i and tyrosine phosphorylation. J Cell Biochem. 2003 Aug 1;89(5):1030-43. PMID: 12874836 [PubMed - indexed for MEDLINE]	nanger in human T
□ 64:	Doggrell SA, Hancox JC.	Related Articles, Links
	Is timing everything? Therapeutic potential of modulat (+) transporters. Expert Opin Investig Drugs. 2003 Jul;12(7):1123-42. Review. PMID: 12831348 [PubMed - indexed for MEDLINE]	ors of cardiac Na
□ 65:	Kawano S, Otsu K, Shoji S, Yamagata K, Hiraoka M.	Related Articles, Links
	Ca(2+) oscillations regulated by Na(+)-Ca(2+) exchangemembrane Ca(2+) pump induce fluctuations of membrane potentials in human mesenchymal stem cells. Cell Calcium. 2003 Aug;34(2):145-56. PMID: 12810056 [PubMed - indexed for MEDLINE]	
□ 66:	Reddy HK, Wasson S, Koshy SK, Komatireddy R.	Related Articles, Links
	Structural correlates of electrical remodeling in ventric Cardiovasc Res. 2003 Jun 1;58(3):495-7. No abstract available. PMID: 12798420 [PubMed - indexed for MEDLINE]	ular hypertrophy.
□ 67:	Moreau R, Daoud G, Masse A, Simoneau L, Lafond J.	Related Articles, Links
	Expression and role of calcium-ATPase pump and sodi exchanger in differentiated trophoblasts from human te Mol Reprod Dev. 2003 Jul;65(3):283-8. PMID: 12784250 [PubMed - indexed for MEDLINE]	
□ 68:	Blank ME, Ehmke H.	Related Articles, Links
	Aquaporin-1 and HCO3(-)-Cl- transporter-mediated tra across the human erythrocyte membrane. J Physiol. 2003 Jul 15;550(Pt 2):419-29. Epub 2003 May 16. PMID: 12754312 [PubMed - indexed for MEDLINE]	insport of CO2

□ 69:	Quednau BD, Nicoll DA, Philipson KD.	Related Articles, Links
	The sodium/calcium exchanger family-SLC8. Pflugers Arch. 2004 Feb;447(5):543-8. Epub 2003 May 7. Review PMID: 12734757 [PubMed - indexed for MEDLINE]	v.
□ 70:	Wald FA, Figueroa Y, Oriolo AS, Salas PJ.	Related Articles, Links
	Membrane repolarization is delayed in proximal tubule reperfusion: possible role of microtubule-organizing ce Am J Physiol Renal Physiol. 2003 Aug;285(2):F230-40. Epub 200 PMID: 12709392 [PubMed - indexed for MEDLINE]	enters.
□ 71:	Kang K, Bauer PJ, Kinjo TG, Szerencsei RT, Bonigk W, Winkfein RJ, Schnetkamp PP.	Related Articles, Links
	Assembly of retinal rod or cone Na(+)/Ca(2+)-K(+) ex with cGMP-gated channel subunits as probed with hete expressed cDNAs. Biochemistry. 2003 Apr 22;42(15):4593-600. PMID: 12693957 [PubMed - indexed for MEDLINE]	
□ 72:	Bolli R.	Related Articles, Links
	The role of sodium-hydrogen ion exchange in patients coronary artery bypass grafting. J Card Surg. 2003 Jan-Feb;18 Suppl 1:21-6. Review. PMID: 12691376 [PubMed - indexed for MEDLINE]	undergoing
□ 73:	Schillinger W, Ohler A, Emami S, Muller F, Christians C, Janssen PM, Kogler H, Teucher N, Pieske B, Seidler T, Hasenfuss G.	Related Articles, Links
	The functional effect of adenoviral Na+/Ca2+ exchang in rabbit myocytes depends on the activity of the Na+/I Cardiovasc Res. 2003 Mar 15;57(4):996-1003. PMID: 12650877 [PubMed - indexed for MEDLINE]	
□ 74:	Weisser-Thomas J, Piacentino V 3rd, Gaughan JP, Margulies K, Houser SR.	Related Articles, Links
	Calcium entry via Na/Ca exchange during the action po contributes to contraction of failing human ventricular Cardiovasc Res. 2003 Mar 15;57(4):974-85. PMID: 12650875 [PubMed - indexed for MEDLINE]	otential directly myocytes.
□ 75:	Allen DG, Xiao XH.	Related Articles, Links
	Role of the cardiac Na+/H+ exchanger during ischemia Cardiovasc Res. 2003 Mar 15;57(4):934-41. Review. PMID: 12650871 [PubMed - indexed for MEDLINE]	and reperfusion.
□ 76:	Schillinger W, Fiolet JW, Schlotthauer K, Hasenfuss G.	Related Articles, Links
	Relevance of Na+-Ca2+ exchange in heart failure. Cardiovasc Res. 2003 Mar 15;57(4):921-33. Review. No abstract PMID: 12650870 [PubMed - indexed for MEDLINE]	available.
□ 77:	He LP, Cleemann L, Soldatov NM, Morad M.	Related Articles, Links
	Molecular determinants of cAMP-mediated regulation exchanger expressed in human cell lines. J Physiol. 2003 May 1;548(Pt 3):677-89. Epub 2003 Mar 7. PMID: 12626672 [PubMed - indexed for MEDI INF]	of the Na+-Ca2+

□ 78:	Piper HM, Meuter K, Schafer C.	Related Articles, Links
	Cellular mechanisms of ischemia-reperfusion injury. Ann Thorac Surg. 2003 Feb;75(2):S644-8. Review. PMID: 12607706 [PubMed - indexed for MEDLINE]	
□ 79:	Muller-Ehmsen J, Nickel J, Zobel C, Hirsch I, Bolck B, Brixius K, Schwinger RH.	Related Articles, Links
	Longer term effects of ouabain on the contractility of racardiomyocytes and on the expression of Ca and Na reg Basic Res Cardiol. 2003 Mar;98(2):90-6. PMID: 12607130 [PubMed - indexed for MEDLINE]	
□80:	Piacentino V 3rd, Weber CR, Chen X, Weisser-Thomas J, Margulies KB, Bers DM, Houser SR.	Related Articles, Links
	Cellular basis of abnormal calcium transients of failing myocytes. Circ Res. 2003 Apr 4;92(6):651-8. Epub 2003 Feb 20. PMID: 12600875 [PubMed - indexed for MEDLINE]	human ventricular
□81:	Pogwizd SM.	Related Articles, Links
	Clinical potential of sodium-calcium exchanger inhibite antiarrhythmic agents. Drugs. 2003;63(5):439-52. Review. PMID: 12600224 [PubMed - indexed for MEDLINE]	ors as
□ 82:	Kinjo TG, Szerencsei RT, Winkfein RJ, Kang K, Schnetkamp PP.	Related Articles, Links
	Topology of the retinal cone NCKX2 Na/Ca-K exchange Biochemistry. 2003 Mar 4;42(8):2485-91. PMID: 12600216 [PubMed - indexed for MEDLINE]	ger.
□83:	Prinsen CF, Cooper CB, Szerencsei RT, Murthy SK, Demetrick DJ, Schnetkamp PP.	Related Articles, Links
	The retinal rod and cone Na+/Ca2+-K+ exchangers. Adv Exp Med Biol. 2002;514:237-51. Review. PMID: 12596925 [PubMed - indexed for MEDLINE]	
□84:	Lakatta EG, Maltsev VA, Bogdanov KY, Stern MD, Vinogradova TM.	Related Articles, Links
	Cyclic variation of intracellular calcium: a critical factor pacemaker cell dominance. Circ Res. 2003 Feb 21;92(3):e45-50. Review. PMID: 12595348 [PubMed - indexed for MEDLINE]	or for cardiac
□85:	Mohler PJ, Schott JJ, Gramolini AO, Dilly KW, Guatimosim S, duBell WH, Song LS, Haurogne K, Kyndt F, Ali ME, Rogers TB, Lederer WJ, Escande D, Le Marec H, Bennett V.	Related Articles, Links
	Ankyrin-B mutation causes type 4 long-QT cardiac arrisudden cardiac death. Nature. 2003 Feb 6;421(6923):634-9. PMID: 12571597 [PubMed - indexed for MEDLINE]	hythmia and
□ 86:	Nattel S.	Related Articles, Links
	Human genetics: Lost anchors cost lives. Nature. 2003 Feb 6;421(6923):587, 589-90. No abstract available. PMID: 12571577 [PubMed - indexed for MEDLINE]	

□ 87:	Gabellini N, Bortoluzzi S, Danieli GA, Carafoli E.	Related Articles, Links
	Control of the Na+/Ca2+ exchanger 3 promoter by cyc monophosphate and Ca2+ in differentiating neurons. J Neurochem. 2003 Jan;84(2):282-93. PMID: 12558991 [PubMed - indexed for MEDLINE]	lic adenosine
□ 88:	Del Monte F, Johnson CM, Stepanek AC, Doye AA, Gwathmey JK.	Related Articles, Links
	Defects in calcium control. J Card Fail. 2002 Dec;8(6 Suppl):S421-31. PMID: 12555155 [PubMed - indexed for MEDLINE]	
□ 89:	Abramov AY, Duchen MR.	Related Articles, Links
	Actions of ionomycin, 4-BrA23187 and a novel electronionophore on mitochondria in intact cells. Cell Calcium. 2003 Feb;33(2):101-12. PMID: 12531186 [PubMed - indexed for MEDLINE]	ogenic Ca2+
□ 90:	Winkfein RJ, Szerencsei RT, Kinjo TG, Kang K, Perizzolo M, Eisner L, Schnetkamp PP.	Related Articles, Links
	Scanning mutagenesis of the alpha repeats and of the tracidic residues of the human retinal cone Na/Ca-K exc. Biochemistry. 2003 Jan 21;42(2):543-52. PMID: 12525183 [PubMed - indexed for MEDLINE]	
□91:	del Monte F, Hajjar RJ.	Related Articles, Links
	Targeting calcium cycling proteins in heart failure thro J Physiol. 2003 Jan 1;546(Pt 1):49-61. Review. PMID: 12509478 [PubMed - indexed for MEDLINE]	ugh gene transfer.
□ 92:	Moreau R, Simoneau L, Lafond J.	Related Articles, Links
	Calcium fluxes in human trophoblast (BeWo) cells: calcium-ATPase, and sodium-calcium exchanger express Mol Reprod Dev. 2003 Feb;64(2):189-98. PMID: 12506351 [PubMed - indexed for MEDLINE]	
□ 93:	Terracciano C.	Related Articles, Links
	Functional consequences of Na/Ca exchanger overexpr myocytes. Ann N Y Acad Sci. 2002 Nov;976:520-7. PMID: 12502606 [PubMed - indexed for MEDLINE]	ression in cardiac
□94:	Bers DM, Weber CR.	Related Articles, Links
	Na/Ca exchange function in intact ventricular myocyte Ann N Y Acad Sci. 2002 Nov;976:500-12. PMID: 12502604 [PubMed - indexed for MEDLINE]	s.
□95:	Weber CR, Piacentino V 3rd, Margulies KB, Bers DM, Houser SR.	Related Articles, Links
	Calcium influx via I(NCX) is favored in failing human myocytes. Ann N Y Acad Sci. 2002 Nov;976:478-9. No abstract available. PMID: 12502599 [PubMed - indexed for MEDLINE]	ventricular
□96:	Piacentino V 3rd, Margulies KB, Houser SR.	Related Articles, Links

	Ca influx via the Na/Ca exchanger maintains sarcoplas content in failing human myocytes. Ann N Y Acad Sci. 2002 Nov;976:476-7. No abstract available. PMID: 12502598 [PubMed - indexed for MEDLINE]	smic reticulum Ca
□ 97:	Piacentino V 3rd, Weber CR, Gaughan JP, Margulies KB, Bers DM, Houser SR.	Related Articles, Links
	Modulation of contractility in failing human myocytes Na/Ca exchange. Ann N Y Acad Sci. 2002 Nov;976:466-71. Review. PMID: 12502596 [PubMed - indexed for MEDLINE]	by reverse-mode
□ 98:	Sipido KR, Volders PG, Schoenmakers M, De Groot SH, Verdonck F, Vos MA.	Related Articles, Links
	Role of the Na/Ca exchanger in arrhythmias in comper Ann N Y Acad Sci. 2002 Nov;976:438-45. Review. PMID: 12502593 [PubMed - indexed for MEDLINE]	nsated hypertrophy.
□ 99:	Murphy E, Cross HR, Steenbergen C.	Related Articles, Links
	Is Na/Ca exchange during ischemia and reperfusion be	eneficial or
 J	detrimental? Ann N Y Acad Sci. 2002 Nov;976:421-30. Review. PMID: 12502591 [PubMed - indexed for MEDLINE]	
□ 100	Tortiglione A, Pignataro G, Minale M, Secondo A, Scorziello A, Di Renzo GF, Amoroso S, Caliendo G, Santagada V, Annunziato L.	Related Articles, Links
	Na+/Ca2+ exchanger in Na+ efflux-Ca2+ influx mode exerts a neuroprotective role in cellular models of invivo cerebral ischemia. Ann N Y Acad Sci. 2002 Nov;976:408-12. No abstract available PMID: 12502588 [PubMed - indexed for MEDLINE]	vitro anoxia and in
□ 101	: Lytton J, Li XF, Dong H, Kraev A.	Related Articles, Links
	K+-dependent Na+/Ca2+ exchangers in the brain. Ann N Y Acad Sci. 2002 Nov;976:382-93. PMID: 12502585 [PubMed - indexed for MEDLINE]	
□ 102	Bose R, Li Y, Roberts D.	Related Articles, Links
	Na+/Ca2+ exchange in activated and nonactivated hu Ann N Y Acad Sci. 2002 Nov;976:350-3. No abstract available. PMID: 12502580 [PubMed - indexed for MEDLINE]	
□ 103	Roberts DE, Bose R.	Related Articles, Links
	Reverse mode Na+/Ca2+ exchange in the collagen ac platelets. Ann N Y Acad Sci. 2002 Nov;976:345-9. No abstract available. PMID: 12502579 [PubMed - indexed for MEDLINE]	tivation of human
□ 104	Gabellini N, Bortoluzzi S, Danieli GA, Carafoli E.	Related Articles, Links
	The gene promoter of human Na+/Ca2+ exchanger is is controlled by cAMP and calcium. Ann N Y Acad Sci. 2002 Nov;976:282-4. No abstract available. PMID: 12502570 [PubMed - indexed for MEDLINE]	oform 3 (SLC8A3)
	Jordan MC, Quednau BD, Roos KP, Ross RS, Philipson KD,	Related Articles, Links

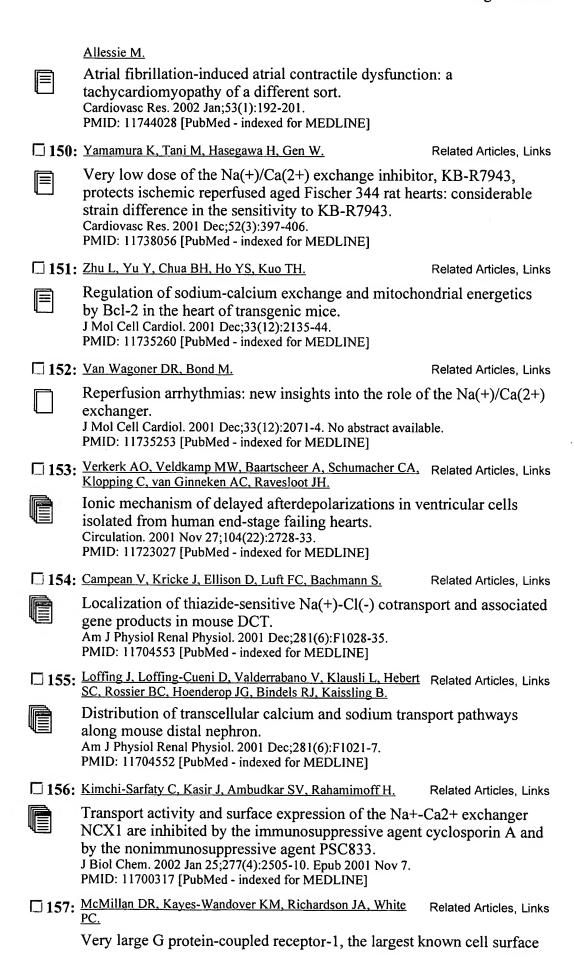
□ 105:	Nicholas SB.	
	Cyclosporin A regulates sodium-calcium exchanger (expression in vitro and cardiac hypertrophy in NCX1 Ann N Y Acad Sci. 2002 Nov;976:259-67. PMID: 12502568 [PubMed - indexed for MEDLINE]	<i>,</i> 0
□ 106:	Schulze DH, Polumuri SK, Gille T, Ruknudin A.	Related Articles, Links
	Functional regulation of alternatively spliced Na+/Ca (NCX1) isoforms. Ann N Y Acad Sci. 2002 Nov;976:187-96. Review. PMID: 12502560 [PubMed - indexed for MEDLINE]	2+ exchanger
□ 107:	Rahamimoff H, Ren X, Kimchi-Sarfaty C, Ambudkar S, Kasir J.	Related Articles, Links
	NCX1 surface expression: a tool to identify structural functional importance. Ann N Y Acad Sci. 2002 Nov;976:176-86. PMID: 12502559 [PubMed - indexed for MEDLINE]	elements of
□ 108:	Dong H, Dunn J, Lytton J.	Related Articles, Links
	Electrophysiological studies of the cloned rat cardiac transfected HEK cells: a focus on the stoichiometry. Ann N Y Acad Sci. 2002 Nov;976:159-65. No abstract available PMID: 12502557 [PubMed - indexed for MEDLINE]	
□ 109:	Lytton J, Dong H.	Related Articles, Links
	Rat heart NCX1.1 stoichiometry measured in a transfe Ann N Y Acad Sci. 2002 Nov;976:137-41. PMID: 12502552 [PubMed - indexed for MEDLINE]	ected cell system.
□ 110:	Yoo SS, Leach S, Lytton J.	Related Articles, Links
	Studies on the oligomeric state of the sodium/calcium exchanger NCKX2. Ann N Y Acad Sci. 2002 Nov;976:94-6. No abstract available. PMID: 12502543 [PubMed - indexed for MEDLINE]	+ potassium
□111:	Cai X, Zhang K, Lytton J.	Related Articles, Links
	Topological studies of the rat brain K+-dependent Na NCKX2. Ann N Y Acad Sci. 2002 Nov;976:90-3. No abstract available. PMID: 12502542 [PubMed - indexed for MEDLINE]	+/Ca2+ exchanger
□112:	Van Eylen F, Kamagate A, Herchuelz A.	Related Articles, Links
	Characterization and functional activity of a truncated isoform resulting from a new splicing pattern of NCX Ann N Y Acad Sci. 2002 Nov;976:81-4. No abstract available. PMID: 12502539 [PubMed - indexed for MEDLINE]	_
□ 113:	Mejia-Elizondo R, Espinosa-Tanguma R, Saavedra-Alanis VM.	Related Articles, Links
	Molecular identification of the NCX isoform expresses smooth muscle of guinea pig. Ann N Y Acad Sci. 2002 Nov;976:73-6. No abstract available. PMID: 12502537 [PubMed - indexed for MEDLINE]	ed in tracheal

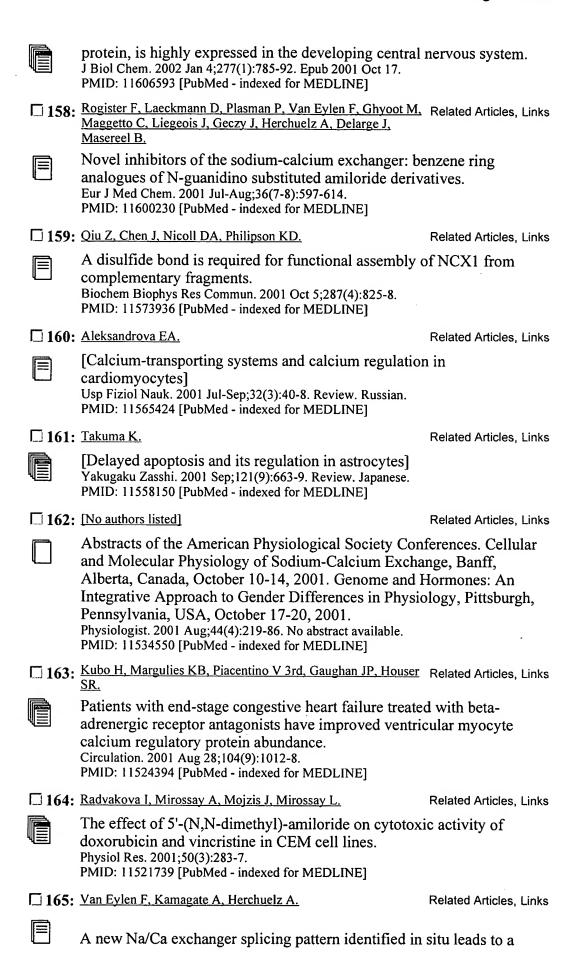
□ 114:	Kraev A, MacLennan D.	Related Articles, Links
	Toward comparative genomics of calcium transporter Ann N Y Acad Sci. 2002 Nov;976:53-9. Review. No abstract av PMID: 12502533 [PubMed - indexed for MEDLINE]	
□ 115:	Szerencsei RT, Winkfein RJ, Cooper CB, Prinsen C, Kinjo TG, Kang K, Schnetkamp PP.	Related Articles, Links
	The Na/Ca-K exchanger gene family. Ann N Y Acad Sci. 2002 Nov;976:41-52. Review. PMID: 12502532 [PubMed - indexed for MEDLINE]	
□ 116:	Bers DM, Pogwizd SM, Schlotthauer K.	Related Articles, Links
	Upregulated Na/Ca exchange is involved in both cont and arrhythmogenesis in heart failure. Basic Res Cardiol. 2002;97 Suppl 1:136-42. Review. PMID: 12479232 [PubMed - indexed for MEDLINE]	ractile dysfunction
□ 117:	Reuter H, Philipson KD.	Related Articles, Links
	Sodium-calcium exchanger overexpression in the heat transgenic mouse model. Basic Res Cardiol. 2002;97 Suppl 1:I31-5. Review. PMID: 12479231 [PubMed - indexed for MEDLINE]	rtinsights from a
□ 118:	McDonough AA, Velotta JB, Schwinger RH, Philipson KD, Farley RA.	Related Articles, Links
	The cardiac sodium pump: structure and function. Basic Res Cardiol. 2002;97 Suppl 1:119-24. Review. PMID: 12479229 [PubMed - indexed for MEDLINE]	
□119:	Powis DA, Marley PD.	Related Articles, Links
	Ions, channels, and receptors. Ann N Y Acad Sci. 2002 Oct;971:95-9. Review. PMID: 12438098 [PubMed - indexed for MEDLINE]	
□ 120:	Gabellini N, Bortoluzzi S, Danieli GA, Carafoli E.	Related Articles, Links
	The human SLC8A3 gene and the tissue-specific Na+isoforms. Gene. 2002 Sep 18;298(1):1-7. PMID: 12406570 [PubMed - indexed for MEDLINE]	/Ca2+ exchanger 3
□ 121:	Saksena S, Ammar MS, Tyagi S, Elsharydah A, Gill RK, Ramaswamy K, Dudeja PK.	Related Articles, Links
	Mechanisms of calcium transport in human colonic batter membrane vesicles. Dig Dis Sci. 2002 Oct;47(10):2306-15. PMID: 12395904 [PubMed - indexed for MEDLINE]	asolateral
□ 122:	Petrova R, Yamamoto Y, Muraki K, Yonekura H, Sakurai S, Watanabe T, Li H, Takeuchi M, Makita Z, Kato I, Takasawa S, Okamoto H, Imaizumi Y, Yamamoto H.	Related Articles, Links
	Advanced glycation endproduct-induced calcium hand in mouse cardiac myocytes. J Mol Cell Cardiol. 2002 Oct;34(10):1425-31. PMID: 12393002 [PubMed - indexed for MEDLINE]	dling impairment
□ 123:	Fink K, Meder WP, Clusmann H, Gothert M.	Related Articles, Links

Ca2+ entry via P/Q-type Ca2+ channels and the Na+/Ca2+ exchanger in rat and human neocortical synaptosomes. Naunyn Schmiedebergs Arch Pharmacol. 2002 Nov;366(5):458-63. Epub 2002 Sep 6. PMID: 12382075 [PubMed - indexed for MEDLINE] 124: Li XF, Kraev AS, Lytton J. Related Articles, Links Molecular cloning of a fourth member of the potassium-dependent sodium-calcium exchanger gene family, NCKX4. J Biol Chem. 2002 Dec 13;277(50):48410-7. Epub 2002 Oct 11. PMID: 12379639 [PubMed - indexed for MEDLINE] 125: Cai X, Zhang K, Lytton J. Related Articles, Links A novel topology and redox regulation of the rat brain K+-dependent Na+/Ca2+ exchanger, NCKX2. J Biol Chem. 2002 Dec 13;277(50):48923-30. Epub 2002 Oct 10. PMID: 12377762 [PubMed - indexed for MEDLINE] 126: Chu SL, Zhu DL, Xiong MM, Wang GL, Zhang WZ, Zhou HF, Related Articles, Links Shen D, Gao PJ, Zhan YM, Jin L. Linkage analysis of twelve candidate gene loci regulating water and sodium metabolism and membrane ion transport in essential hypertension. Hypertens Res. 2002 Jul;25(4):635-9. PMID: 12358153 [PubMed - indexed for MEDLINE] 127: Kiedrowski L, Czyz A, Li XF, Lytton J. Related Articles, Links Preferential expression of plasmalemmal K-dependent Na+/Ca2+ exchangers in neurons versus astrocytes. Neuroreport. 2002 Aug 27;13(12):1529-32. PMID: 12218699 [PubMed - indexed for MEDLINE] 128: Deval E, Levitsky DO, Marchand E, Cantereau A, Raymond G, Related Articles, Links Cognard C. Na(+)/Ca(2+) exchange in human myotubes: intracellular calcium rises in response to external sodium depletion are enhanced in DMD. Neuromuscul Disord. 2002 Oct;12(7-8):665-73. PMID: 12207936 [PubMed - indexed for MEDLINE] 129: Lee SH, Kim MH, Park KH, Earm YE, Ho WK. Related Articles, Links K+-dependent Na+/Ca2+ exchange is a major Ca2+ clearance mechanism in axon terminals of rat neurohypophysis. J Neurosci. 2002 Aug 15;22(16):6891-9. PMID: 12177187 [PubMed - indexed for MEDLINE] □ 130: Dillmann WH. Related Articles, Links Cellular action of thyroid hormone on the heart. Thyroid. 2002 Jun; 12(6):447-52. Review. PMID: 12165105 [PubMed - indexed for MEDLINE] 131: Dunn J, Elias CL, Le HD, Omelchenko A, Hryshko LV, Lytton Related Articles, Links The molecular determinants of ionic regulatory differences between brain and kidney Na+/Ca2+ exchanger (NCX1) isoforms. J Biol Chem. 2002 Sep 13;277(37):33957-62. Epub 2002 Jul 12. PMID: 12118014 [PubMed - indexed for MEDLINE]

132: Muller JG, Thompson JT, Edmonson AM, Rackley MS, Related Articles, Links Kasahara H, Izumo S, McQuinn TC, Menick DR, O'Brien TX. Differential regulation of the cardiac sodium calcium exchanger promoter in adult and neonatal cardiomyocytes by Nkx2.5 and serum response factor. J Mol Cell Cardiol. 2002 Jul;34(7):807-21. PMID: 12099720 [PubMed - indexed for MEDLINE] ☐ 133: Bautista DM, Hoth M, Lewis RS. Related Articles, Links Enhancement of calcium signalling dynamics and stability by delayed modulation of the plasma-membrane calcium-ATPase in human T cells. J Physiol. 2002 Jun 15;541(Pt 3):877-94. PMID: 12068047 [PubMed - indexed for MEDLINE] 134: Mizuno S, Demura Y, Ameshima S, Okamura S, Miyamori I, Related Articles, Links Ishizaki T. Alkalosis stimulates endothelial nitric oxide synthase in cultured human pulmonary arterial endothelial cells. Am J Physiol Lung Cell Mol Physiol. 2002 Jul;283(1):L113-9. PMID: 12060567 [PubMed - indexed for MEDLINE] 135: Cullinane AB, Coca-Prados M, Harvey BJ. Related Articles, Links Extracellular ATP effects on calcium signaling in cultured human non-pigmented ciliary body epithelium. Curr Eye Res. 2001 Dec;23(6):448-54. PMID: 12045895 [PubMed - indexed for MEDLINE] 136: Sharon D, Yamamoto H, McGee TL, Rabe V, Szerencsei RT, Related Articles, Links Winkfein RJ, Prinsen CF, Barnes CS, Andreasson S, Fishman GA, Schnetkamp PP, Berson EL, Dryja TP. Mutated alleles of the rod and cone Na-Ca+K-exchanger genes in patients with retinal diseases. Invest Ophthalmol Vis Sci. 2002 Jun;43(6):1971-9. PMID: 12037007 [PubMed - indexed for MEDLINE] 137: Diaz-Horta O, Kamagate A, Herchuelz A, Van Eylen F. Related Articles, Links Na/Ca exchanger overexpression induces endoplasmic reticulum-related apoptosis and caspase-12 activation in insulin-releasing BRIN-BD11 cells. Diabetes. 2002 Jun;51(6):1815-24. PMID: 12031969 [PubMed - indexed for MEDLINE] ☐ 138: Su YH, Vacquier VD. Related Articles, Links A flagellar K(+)-dependent Na(+)/Ca(2+) exchanger keeps Ca(2+) low in sea urchin spermatozoa. Proc Natl Acad Sci U S A. 2002 May 14;99(10):6743-8. PMID: 12011436 [PubMed - indexed for MEDLINE] 139: Thayer SA, Usachev YM, Pottorf WJ. Related Articles, Links Modulating Ca2+ clearance from neurons. Front Biosci. 2002 May 1;7:d1255-79. Review. PMID: 11991858 [PubMed - indexed for MEDLINE] **□ 140:** Related Articles, Links Ranu HK, Terracciano CM, Davia K, Bernobich E, Chaudhri B, Robinson SE, Bin Kang Z, Hajjar RJ, MacLeod KT, Harding

	SE.	
	Effects of Na(+)/Ca(2+)-exchanger overexpression o contraction coupling in adult rabbit ventricular myoc J Mol Cell Cardiol. 2002 Apr;34(4):389-400. PMID: 11991729 [PubMed - indexed for MEDLINE]	
□ 141	: Bers DM.	Related Articles, Links
	Cardiac Na/Ca exchange function in rabbit, mouse ar difference? J Mol Cell Cardiol. 2002 Apr;34(4):369-73. No abstract availab PMID: 11991726 [PubMed - indexed for MEDLINE]	
□ 142	Sipido KR, Volders PG, Vos MA, Verdonck F.	Related Articles, Links
	Altered Na/Ca exchange activity in cardiac hypertrop failure: a new target for therapy? Cardiovasc Res. 2002 Mar;53(4):782-805. Review. PMID: 11922890 [PubMed - indexed for MEDLINE]	ohy and heart
□ 143	: Dong H, Dunn J, Lytton J.	Related Articles, Links
	Stoichiometry of the Cardiac Na+/Ca2+ exchanger N transfected HEK cells. Biophys J. 2002 Apr;82(4):1943-52. PMID: 11916852 [PubMed - indexed for MEDLINE]	ICX1.1 measured in
□ 144	: Billman GE.	Related Articles, Links
	KB-R7943. Kanebo. Curr Opin Investig Drugs. 2001 Dec;2(12):1740-5. Review. PMID: 11892938 [PubMed - indexed for MEDLINE]	
□ 145	: <u>Kiyosue T.</u>	Related Articles, Links
	Removal of intracellular Mg(2+) activates cardiac Na exchanger. Cardiovasc Res. 2002 Feb 1;53(2):290-1. No abstract available. PMID: 11827677 [PubMed - indexed for MEDLINE]	
□ 146	Van Eylen F, Horta OD, Barez A, Kamagate A, Flatt PR, Macianskiene R, Mubagwa K, Herchuelz A.	Related Articles, Links
	Overexpression of the Na/Ca exchanger shapes stimul cytosolic Ca(2+) oscillations in insulin-producing BR Diabetes. 2002 Feb;51(2):366-75. PMID: 11812743 [PubMed - indexed for MEDLINE]	
□ 147	Bose R, Li Y, Woo V.	Related Articles, Links
	Sodium-calcium exchange in platelets of diabetics. Proc West Pharmacol Soc. 2001;44:183-4. No abstract available PMID: 11793976 [PubMed - indexed for MEDLINE]	3 .
□ 148	Berna N, Arnould T, Remacle J, Michiels C.	Related Articles, Links
	Hypoxia-induced increase in intracellular calcium conendothelial cells: role of the Na(+)-glucose cotransport J Cell Biochem. 2001;84(1):115-31. PMID: 11746521 [PubMed - indexed for MEDLINE]	
□ 149	Schotten U, Greiser M, Benke D, Buerkel K, Ehrenteidt B, Stellbrink C, Vazquez-Jimenez JF, Schoendube F, Hanrath P,	Related Articles, Links





	functionally active 70kDa NH(2)-terminal protein. Cell Calcium. 2001 Sep;30(3):191-8. PMID: 11508998 [PubMed - indexed for MEDLINE]	
□ 166	Conway SJ, Koushik SV.	Related Articles, Links
	Cardiac sodium-calcium exchanger: a double-edged s Cardiovasc Res. 2001 Aug 1;51(2):194-7. Review. No abstract a PMID: 11470457 [PubMed - indexed for MEDLINE]	
□ 167	Balasubramanyam M, Balaji RA, Subashini B, Mohan V.	Related Articles, Links
	Evidence for mechanistic alterations of Ca2+ homeos diabetes mellitus. Int J Exp Diabetes Res. 2001;1(4):275-87. PMID: 11467418 [PubMed - indexed for MEDLINE]	stasis in Type 2
□ 168	Park SI, Park EJ, Kim NH, Baek WK, Lee YT, Lee CJ, Suh CK.	Related Articles, Links
	Hypoxia delays the intracellular Ca2+ clearance by Nexchanger in human adult cardiac myocytes. Yonsei Med J. 2001 Jun;42(3):333-7. PMID: 11456400 [PubMed - indexed for MEDLINE]	la+-Ca2+
□ 169	Lipsius SL, Huser J, Blatter LA.	Related Articles, Links
	Intracellular Ca2+ release sparks atrial pacemaker act News Physiol Sci. 2001 Jun;16:101-6. Review. PMID: 11443225 [PubMed - indexed for MEDLINE]	tivity.
□ 170	Houser SR, Piacentino V 3rd, Mattiello J, Weisser J, Gaughan JP.	Related Articles, Links
	Functional properties of failing human ventricular my	ocytes
L	Trends Cardiovasc Med. 2000 Apr;10(3):101-7. Review. PMID: 11427996 [PubMed - indexed for MEDLINE]	vocytes.
☐ 171 :		Related Articles, Links
	PMID: 11427996 [PubMed - indexed for MEDLINE]	Related Articles, Links
	PMID: 11427996 [PubMed - indexed for MEDLINE] Lee VM, Halligan AW, Ng LL. Leucocyte intracellular pH and Na+/H+ exchanger is postpartum women with pre-eclampsia. BJOG. 2001 Jun;108(6):615-22.	Related Articles, Links
	PMID: 11427996 [PubMed - indexed for MEDLINE] Lee VM, Halligan AW, Ng LL. Leucocyte intracellular pH and Na+/H+ exchanger isopostpartum women with pre-eclampsia. BJOG. 2001 Jun;108(6):615-22. PMID: 11426897 [PubMed - indexed for MEDLINE] Kawamoto T, Kimura H, Kusumoto K, Fukumoto S, Shiraishi	Related Articles, Links of orm-1 activity in Related Articles, Links exchanger isoform
	PMID: 11427996 [PubMed - indexed for MEDLINE] Lee VM, Halligan AW, Ng LL. Leucocyte intracellular pH and Na+/H+ exchanger isopostpartum women with pre-eclampsia. BJOG. 2001 Jun;108(6):615-22. PMID: 11426897 [PubMed - indexed for MEDLINE] Kawamoto T, Kimura H, Kusumoto K, Fukumoto S, Shiraishi M, Watanabe T, Sawada H. Potent and selective inhibition of the human Na+/H+ NHE1 by a novel aminoguanidine derivative T-16253 Eur J Pharmacol. 2001 May 18;420(1):1-8.	Related Articles, Links of orm-1 activity in Related Articles, Links exchanger isoform
	PMID: 11427996 [PubMed - indexed for MEDLINE] Lee VM, Halligan AW, Ng LL. Leucocyte intracellular pH and Na+/H+ exchanger isopostpartum women with pre-eclampsia. BJOG. 2001 Jun;108(6):615-22. PMID: 11426897 [PubMed - indexed for MEDLINE] Kawamoto T, Kimura H, Kusumoto K, Fukumoto S, Shiraishi M, Watanabe T, Sawada H. Potent and selective inhibition of the human Na+/H+ NHE1 by a novel aminoguanidine derivative T-16253 Eur J Pharmacol. 2001 May 18;420(1):1-8. PMID: 11412833 [PubMed - indexed for MEDLINE]	Related Articles, Links of orm-1 activity in Related Articles, Links exchanger isoform 59. Related Articles, Links tracet failure: Roles of
	PMID: 11427996 [PubMed - indexed for MEDLINE] Lee VM, Halligan AW, Ng LL. Leucocyte intracellular pH and Na+/H+ exchanger isopostpartum women with pre-eclampsia. BJOG. 2001 Jun;108(6):615-22. PMID: 11426897 [PubMed - indexed for MEDLINE] Kawamoto T, Kimura H, Kusumoto K, Fukumoto S, Shiraishi M, Watanabe T, Sawada H. Potent and selective inhibition of the human Na+/H+ NHE1 by a novel aminoguanidine derivative T-16253 Eur J Pharmacol. 2001 May 18;420(1):1-8. PMID: 11412833 [PubMed - indexed for MEDLINE] Pogwizd SM, Schlotthauer K, Li L, Yuan W, Bers DM. Arrhythmogenesis and contractile dysfunction in hear sodium-calcium exchange, inward rectifier potassium residual beta-adrenergic responsiveness. Circ Res. 2001 Jun 8;88(11):1159-67.	Related Articles, Links of orm-1 activity in Related Articles, Links exchanger isoform 59. Related Articles, Links tracet failure: Roles of

	Circ Res. 2001 Jun 8;88(11):1095-6. No abstract available. PMID: 11397771 [PubMed - indexed for MEDLINE]	
□ 175:	Li F, Hayes JK, Wong KC.	Related Articles, Links
	Gene therapy: a novel method for the treatment of my and reperfusion injurymini-review. Acta Anaesthesiol Sin. 2000 Dec;38(4):207-15. Review. PMID: 11392069 [PubMed - indexed for MEDLINE]	yocardial ischemia
□ 176:	Morin D, Hauet T, Spedding M, Tillement J.	Related Articles, Links
	Mitochondria as target for antiischemic drugs. Adv Drug Deliv Rev. 2001 Jul 2;49(1-2):151-74. Review. PMID: 11377809 [PubMed - indexed for MEDLINE]	
□ 177:	Shigekawa M, Iwamoto T.	Related Articles, Links
	Cardiac Na(+)-Ca(2+) exchange: molecular and pharm	macological
*(==)	aspects. Circ Res. 2001 May 11;88(9):864-76. Review. PMID: 11348995 [PubMed - indexed for MEDLINE]	
□ 178:	Muller-Ehmsen J, Wang J, Schwinger RH, McDonough AA.	Related Articles, Links
	Region specific regulation of sodium pump isoform a exchanger expression in the failing human heartright ventricle. Cell Mol Biol (Noisy-le-grand). 2001 Mar;47(2):373-81. PMID: 11357898 [PubMed - indexed for MEDLINE]	nd Na,Ca- tt atrium vs left
□ 179:	Szerencsei RT, Prinsen CF, Schnetkamp PP.	Related Articles, Links
□ 179:	Szerencsei RT, Prinsen CF, Schnetkamp PP. Stoichiometry of the retinal cone Na/Ca-K exchanger expressed in insect cells: comparison with the bovine exchanger. Biochemistry. 2001 May 22;40(20):6009-15. PMID: 11352736 [PubMed - indexed for MEDLINE]	heterologously
	Stoichiometry of the retinal cone Na/Ca-K exchanger expressed in insect cells: comparison with the bovine exchanger. Biochemistry. 2001 May 22;40(20):6009-15.	heterologously
	Stoichiometry of the retinal cone Na/Ca-K exchanger expressed in insect cells: comparison with the bovine exchanger. Biochemistry. 2001 May 22;40(20):6009-15. PMID: 11352736 [PubMed - indexed for MEDLINE]	heterologously heart Na/Ca
☐ 180:	Stoichiometry of the retinal cone Na/Ca-K exchanger expressed in insect cells: comparison with the bovine exchanger. Biochemistry. 2001 May 22;40(20):6009-15. PMID: 11352736 [PubMed - indexed for MEDLINE] Terracciano CM, MacLeod KT. Overexpression of the Na/Ca exchanger and reduced Cardiovasc Res. 2001 Apr;50(1):167-9. No abstract available.	heterologously heart Na/Ca
☐ 180:	Stoichiometry of the retinal cone Na/Ca-K exchanger expressed in insect cells: comparison with the bovine exchanger. Biochemistry. 2001 May 22;40(20):6009-15. PMID: 11352736 [PubMed - indexed for MEDLINE] Terracciano CM, MacLeod KT. Overexpression of the Na/Ca exchanger and reduced Cardiovasc Res. 2001 Apr;50(1):167-9. No abstract available. PMID: 11345943 [PubMed - indexed for MEDLINE]	heterologously heart Na/Ca Related Articles, Links SERCa function. Related Articles, Links
☐ 180: ☐ 181: ☐	Stoichiometry of the retinal cone Na/Ca-K exchanger expressed in insect cells: comparison with the bovine exchanger. Biochemistry. 2001 May 22;40(20):6009-15. PMID: 11352736 [PubMed - indexed for MEDLINE] Terracciano CM, MacLeod KT. Overexpression of the Na/Ca exchanger and reduced Cardiovasc Res. 2001 Apr;50(1):167-9. No abstract available. PMID: 11345943 [PubMed - indexed for MEDLINE] Reddy PR, Patni A, Sharma A, Gupta S, Tiwary AK. Effect of 2',4'-dichlorobenzamil hydrochloride, a Na(exchange inhibitor, on human spermatozoa. Eur J Pharmacol. 2001 Apr 20;418(1-2):153-5.	heterologously heart Na/Ca Related Articles, Links SERCa function. Related Articles, Links
☐ 180: ☐ 181: ☐	Stoichiometry of the retinal cone Na/Ca-K exchanger expressed in insect cells: comparison with the bovine exchanger. Biochemistry. 2001 May 22;40(20):6009-15. PMID: 11352736 [PubMed - indexed for MEDLINE] Terracciano CM, MacLeod KT. Overexpression of the Na/Ca exchanger and reduced Cardiovasc Res. 2001 Apr;50(1):167-9. No abstract available. PMID: 11345943 [PubMed - indexed for MEDLINE] Reddy PR, Patni A, Sharma A, Gupta S, Tiwary AK. Effect of 2',4'-dichlorobenzamil hydrochloride, a Na(exchange inhibitor, on human spermatozoa. Eur J Pharmacol. 2001 Apr 20;418(1-2):153-5. PMID: 11334878 [PubMed - indexed for MEDLINE]	heterologously heart Na/Ca Related Articles, Links SERCa function. Related Articles, Links +)-Ca(2+)
☐ 180: ☐ 181: ☐ 182: ☐	Stoichiometry of the retinal cone Na/Ca-K exchanger expressed in insect cells: comparison with the bovine exchanger. Biochemistry. 2001 May 22;40(20):6009-15. PMID: 11352736 [PubMed - indexed for MEDLINE] Terracciano CM, MacLeod KT. Overexpression of the Na/Ca exchanger and reduced Cardiovasc Res. 2001 Apr;50(1):167-9. No abstract available. PMID: 11345943 [PubMed - indexed for MEDLINE] Reddy PR, Patni A, Sharma A, Gupta S, Tiwary AK. Effect of 2',4'-dichlorobenzamil hydrochloride, a Na(exchange inhibitor, on human spermatozoa. Eur J Pharmacol. 2001 Apr 20;418(1-2):153-5. PMID: 11334878 [PubMed - indexed for MEDLINE] Bhattacharjee AK, Nagashima T, Kondoh T, Tamaki N. The effects of the Na(+)/Ca(++) exchange blocker on brain barrier disruption. Brain Res. 2001 May 11;900(2):157-62.	heterologously heart Na/Ca Related Articles, Links SERCa function. Related Articles, Links +)-Ca(2+)



sodium-calcium exchanger gene family, NCKX3. J Biol Chem. 2001 Jun 22;276(25):23161-72. Epub 2001 Apr 9. PMID: 11294880 [PubMed - indexed for MEDLINE]

☐ 184: Takano S, Kimura J, Ono T.

Related Articles, Links

Inhibition of aggregation of rabbit and human platelets induced by adrenaline and 5-hydroxytryptamine by KB-R7943, a Na(+)/Ca(2+) exchange inhibitor.

Br J Pharmacol. 2001 Apr;132(7):1383-8.

PMID: 11264230 [PubMed - indexed for MEDLINE]

☐ 185: Li Y, Woo V, Bose R.

Related Articles, Links



Platelet hyperactivity and abnormal Ca(2+) homeostasis in diabetes mellitus.

Am J Physiol Heart Circ Physiol. 2001 Apr;280(4):H1480-9. PMID: 11247757 [PubMed - indexed for MEDLINE]

☐ 186: Van Eylen F, Bollen A, Herchuelz A.

Related Articles, Links

NCX1 Na/Ca exchanger splice variants in pancreatic islet cells.

J Endocrinol. 2001 Mar;168(3):517-26.

PMID: 11241183 [PubMed - indexed for MEDLINE]

☐ 187: Kim JA, Kang YY, Lee YS.

Related Articles, Links

Activation of Na(+), K(+), Cl(-)-cotransport mediates intracellular Ca (2+) increase and apoptosis induced by Pinacidil in HepG2 human hepatoblastoma cells.

Biochem Biophys Res Commun. 2001 Feb 23;281(2):511-9. PMID: 11181077 [PubMed - indexed for MEDLINE]

☐ 188: Gabellini N.

Related Articles, Links



A polymorphic GT repeat from the human cardiac Na+Ca2+ exchanger intron 2 activates splicing.

Eur J Biochem. 2001 Feb;268(4):1076-83.

PMID: 11179974 [PubMed - indexed for MEDLINE]

189: Brown RE, Stevens DR, Haas HL.

Related Articles, Links



The physiology of brain histamine.

Prog Neurobiol. 2001 Apr;63(6):637-72. Review. PMID: 11164999 [PubMed - indexed for MEDLINE]

190: Poon S, Leach S, Li XF, Tucker JE, Schnetkamp PP, Lytton J. Related Articles, Links



Alternatively spliced isoforms of the rat eye sodium/calcium+potassium exchanger NCKX1.

Am J Physiol Cell Physiol. 2000 Apr;278(4):C651-60. PMID: 10751314 [PubMed - indexed for MEDLINE]

☐ 191: Ren X, Kasir J, Rahamimoff H.

Related Articles, Links



The transport activity of the Na+-Ca2+ exchanger NCX1 expressed in HEK 293 cells is sensitive to covalent modification of intracellular cysteine residues by sulfhydryl reagents.

J Biol Chem. 2001 Mar 23;276(12):9572-9. Epub 2000 Dec 27.

PMID: 11134012 [PubMed - indexed for MEDLINE]

☐ **192**: <u>Isenberg G.</u>

Related Articles, Links

	How can overexpression of Na(+),Ca(2+)-exchanger compensate the negative inotropic effects of downregulated SERCA? Cardiovasc Res. 2001 Jan;49(1):1-6. Review. No abstract available. PMID: 11121788 [PubMed - indexed for MEDLINE]	
□ 193:	Nattel S.	Related Articles, Links
	Acquired delayed rectifier channelopathies: how hear antiarrhythmic drugs mimic potentially-lethal congentials orders. Cardiovasc Res. 2000 Nov;48(2):188-90. No abstract available. PMID: 11054465 [PubMed - indexed for MEDLINE]	
□ 194:	Qiu Z, Nicoll DA, Philipson KD.	Related Articles, Links
	Helix packing of functionally important regions of the (2+) exchanger. J Biol Chem. 2001 Jan 5;276(1):194-9. PMID: 11035002 [PubMed - indexed for MEDLINE]	e cardiac Na(+)-Ca
□ 195:	Pogwizd SM.	Related Articles, Links
	Increased Na(+)-Ca(2+) exchanger in the failing heart Circ Res. 2000 Oct 13;87(8):641-3. No abstract available. PMID: 11029397 [PubMed - indexed for MEDLINE]	t.
□ 196:	Sheng JZ, Prinsen CF, Clark RB, Giles WR, Schnetkamp PP.	Related Articles, Links
	Na(+)-Ca(2+)-K(+) currents measured in insect cells the retinal cone or rod Na(+)-Ca(2+)-K(+) exchanger Biophys J. 2000 Oct;79(4):1945-53. PMID: 11023899 [PubMed - indexed for MEDLINE]	
□ 197:	Piper C, Bilger J, Henrichs EM, Wudel E, Schultheiss HP, Horstkotte D, Dorner A.	Related Articles, Links
	[Is Na+Ca(2+) exchanger expression altered in the enpatients with chronic heart valve diseases parallel to a dysfunction?] Z Kardiol. 2000 Aug;89(8):682-90. German. PMID: 11013973 [PubMed - indexed for MEDLINE]	•
□ 198:	Schillinger W, Janssen PM, Emami S, Henderson SA, Ross RS, Teucher N, Zeitz O, Philipson KD, Prestle J, Hasenfuss G.	Related Articles, Links
	Impaired contractile performance of cultured rabbit veryocytes after adenoviral gene transfer of Na(+)-Ca(2 Circ Res. 2000 Sep 29;87(7):581-7. PMID: 11009563 [PubMed - indexed for MEDLINE]	
□ 199:	Barry WH.	Related Articles, Links
	Na(+)-Ca(2+) exchange in failing myocardium: friend Circ Res. 2000 Sep 29;87(7):529-31. No abstract available. PMID: 11009553 [PubMed - indexed for MEDLINE]	l or foe?
□ 200:	Kim JA, Kang YS, Lee SH, Lee YS.	Related Articles, Links
	Inhibitors of Na+/Ca2+ exchanger prevent oxidant-inc Ca2+ increase and apoptosis in a human hepatoma ce Free Radic Res. 2000 Sep;33(3):267-77. PMID: 10993480 [PubMed - indexed for MEDLINE]	

□ 201	Stengl M, Pucelik P.	Related Articles, Links
	[Na+/Ca+ exchange: structure, mechanism, regulation Cesk Fysiol. 2000 May;49(2):73-90. Review. Czech. PMID: 10953508 [PubMed - indexed for MEDLINE]	n and function]
□ 202	Schaffer SW, Lombardini JB, Azuma J.	Related Articles, Links
	Interaction between the actions of taurine and angiote Amino Acids. 2000;18(4):305-18. Review. PMID: 10949914 [PubMed - indexed for MEDLINE]	ensin II.
□ 203	Burkhoff D, Holmes JW, Madigan J, Barbone A, Oz MC.	Related Articles, Links
	Left ventricular assist device-induced reverse ventricular Prog Cardiovasc Dis. 2000 Jul-Aug;43(1):19-26. Review. PMID: 10935554 [PubMed - indexed for MEDLINE]	ular remodeling.
□ 204	McDonald RL, Colyer J, Harrison SM.	Related Articles, Links
	Quantitative analysis of Na+-Ca2+ exchanger express heart. Eur J Biochem. 2000 Aug;267(16):5142-8. PMID: 10931198 [PubMed - indexed for MEDLINE]	sion in guinea-pig
□ 205	Lundquist P, Lundgren T, Gritli-Linde A, Linde A.	Related Articles, Links
	Na+/Ca2+ exchanger isoforms of rat odontoblasts and Calcif Tissue Int. 2000 Jul;67(1):60-7. PMID: 10908415 [PubMed - indexed for MEDLINE]	d osteoblasts.
□ 206	Adam-Vizi V.	Related Articles, Links
	[Neuroprotective effect of sodium channel blockers in pathomechanism of early ischemic dysfunction] Orv Hetil. 2000 Jun 4;141(23):1279-86. Review. Hungarian. PMID: 10905082 [PubMed - indexed for MEDLINE]	n ischemia: the
□ 207:	Wakimoto K, Kuro-O M, Yanaka N, Omori K, Komuro I, Imai Y, Nabeshima Y.	Related Articles, Links
	Isolation and characterization of Na+/Ca2+ exchange isoforms in mice. DNA Seq. 2000;11(1-2):75-81. PMID: 10902911 [PubMed - indexed for MEDLINE]	r gene and splicing
□ 208:	Glendenning P, Ratajczak T, Dick IM, Prince RL.	Related Articles, Links
	Calcitriol upregulates expression and activity of the 1 plasma membrane calcium pump in immortalized discells. Arch Biochem Biophys. 2000 Aug 1;380(1):126-32.	
	PMID: 10900141 [PubMed - indexed for MEDLINE]	
l∃209:	Piper C, Bilger J, Henrichs EM, Schultheiss HP, Horstkotte D, Doerner A.	Related Articles, Links
	Is myocardial Na+/Ca2+ exchanger transcription a mastages of myocardial dysfunction? Quantitative polyn reaction of the messenger RNA in endomyocardial biwith heart failure. J Am Coll Cardiol. 2000 Jul;36(1):233-41. PMID: 10898440 [PubMed - indexed for MEDLINE]	nerase chain

☐ 210: Philipson KD, Nicoll DA. Related Articles, Links Sodium-calcium exchange: a molecular perspective. Annu Rev Physiol. 2000;62:111-33. Review. PMID: 10845086 [PubMed - indexed for MEDLINE] 1211: Nofer JR, Junker R, Seedorf U, Assmann G, Zidek W, Tepel M. Related Articles, Links D609-phosphatidylcholine-specific phospholipase C inhibitor attenuates thapsigargin-induced sodium influx in human lymphocytes. Cell Signal. 2000 May; 12(5):289-96. PMID: 10822169 [PubMed - indexed for MEDLINE] 212: Paltauf-Doburzynska J, Frieden M, Spitaler M, Graier WF. Related Articles, Links Histamine-induced Ca2+ oscillations in a human endothelial cell line depend on transmembrane ion flux, ryanodine receptors and endoplasmic reticulum Ca2+-ATPase. J Physiol. 2000 May 1;524 Pt 3:701-13. PMID: 10790152 [PubMed - indexed for MEDLINE] ☐ 213: Seiler EP, Guerini D, Guidi F, Carafoli E. Related Articles, Links The N-terminal portion of the main cytosolic loop mediates K+ sensitivity in the retinal rod Na+/Ca2+-K+-exchanger. Eur J Biochem. 2000 May;267(9):2461-72. PMID: 10785365 [PubMed - indexed for MEDLINE] 214: Li L, Guerini D, Carafoli E. Related Articles, Links Calcineurin controls the transcription of Na+/Ca2+ exchanger isoforms in developing cerebellar neurons. J Biol Chem. 2000 Jul 7;275(27):20903-10. PMID: 10767288 [PubMed - indexed for MEDLINE] 215: Nakamura H, Kawasaki Y, Arakawa N, Saeki M, Maeda S, Related Articles, Links Koyama Y, Baba A, Matsuda T. The Na+-Ca2+ exchange inhibitor KB-R7943 inhibits high K+-induced increases in intracellular Ca2+ concentration and [3H]noradrenaline release in the human neuroblastoma SH-SY5Y. Neurochem Res. 2000 Mar;25(3):385-7. PMID: 10761983 [PubMed - indexed for MEDLINE] □ 216: Qu Y, Ghatpande A, el-Sherif N, Boutjdir M. Related Articles, Links Gene expression of Na+/Ca2+ exchanger during development in human heart. Cardiovasc Res. 2000 Mar;45(4):866-73. PMID: 10728412 [PubMed - indexed for MEDLINE] 217: Kurosawa M, Numazawa S, Tani Y, Yoshida T. Related Articles, Links ERK signaling mediates the induction of inflammatory cytokines by bufalin in human monocytic cells. Am J Physiol Cell Physiol. 2000 Mar;278(3):C500-8. PMID: 10712238 [PubMed - indexed for MEDLINE] 218: Kiang JG, McClain DE. Related Articles, Links N(omega)-nitro-L-arginine decreases resting cytosolic [Ca2+] and enhances heat stress-induced increase in cytosolic [Ca2+] in human

colon carcinoma T84 cells. Chin J Physiol. 1999 Sep 30;42(3):153-9. PMID: 10707889 [PubMed - indexed for MEDLINE] 219: Bell PD, Mashburn N, Unlap MT. Related Articles, Links Renal sodium/calcium exchange; a vasodilator that is defective in salt-sensitive hypertension. Acta Physiol Scand. 2000 Jan;168(1):209-14. Review. PMID: 10691802 [PubMed - indexed for MEDLINE] **220:** Prinsen CF, Szerencsei RT, Schnetkamp PP. Related Articles, Links Molecular cloning and functional expression of the potassium-dependent sodium-calcium exchanger from human and chicken retinal cone photoreceptors. J Neurosci. 2000 Feb 15;20(4):1424-34. PMID: 10662833 [PubMed - indexed for MEDLINE] 221: McKiernan CJ, Friedlander M. Related Articles, Links The retinal rod Na(+)/Ca(2+), K(+) exchanger contains a noncleaved signal sequence required for translocation of the N terminus. J Biol Chem. 1999 Dec 31;274(53):38177-82. PMID: 10608890 [PubMed - indexed for MEDLINE] 222: Lehnart SE, Schillinger W, Pieske B, Prestle J, Just H, Related Articles, Links Hasenfuss G. Sarcoplasmic reticulum proteins in heart failure. \equiv Ann N Y Acad Sci. 1998 Sep 16;853:220-30. Review. PMID: 10603950 [PubMed - indexed for MEDLINE] ☐ 223: Goldhaber JI. Related Articles, Links Sodium-calcium exchange: the phantom menace. Circ Res. 1999 Nov 26;85(11):982-4. No abstract available. PMID: 10571527 [PubMed - indexed for MEDLINE] 224: Prestle J, Dieterich S, Preuss M, Bieligk U, Hasenfuss G. Related Articles, Links Heterogeneous transmural gene expression of calcium-handling proteins and natriuretic peptides in the failing human heart. Cardiovasc Res. 1999 Aug 1;43(2):323-31. PMID: 10536662 [PubMed - indexed for MEDLINE] 225: Brundel BJ, van Gelder IC, Henning RH, Tuinenburg AE, Related Articles, Links Deelman LE, Tieleman RG, Grandjean JG, van Gilst WH, Crijns HJ. Gene expression of proteins influencing the calcium homeostasis in patients with persistent and paroxysmal atrial fibrillation. Cardiovasc Res. 1999 May;42(2):443-54. PMID: 10533580 [PubMed - indexed for MEDLINE] 226: Zacikova L, Krizanova O. Related Articles, Links [Structure and function of selected Ca(2+) transport systems in cardiac cells] Cesk Fysiol. 1999 May;48(2):62-76. Review. Slovak. PMID: 10510560 [PubMed - indexed for MEDLINE] □ 227: Related Articles, Links Kimura M, Jeanclos EM, Donnelly RJ, Lytton J, Reeves JP,

Aviv A.



Physiological and molecular characterization of the Na+/Ca2+ exchanger in human platelets.

Am J Physiol. 1999 Sep;277(3 Pt 2):H911-7.

PMID: 10484410 [PubMed - indexed for MEDLINE]

☐ 228: Kasir J, Ren X, Furman I, Rahamimoff H.

Related Articles, Links



Truncation of the C terminus of the rat brain Na(+)-Ca(2+) exchanger RBE-1 (NCX1.4) impairs surface expression of the protein.

J Biol Chem. 1999 Aug 27;274(35):24873-80.

PMID: 10455160 [PubMed - indexed for MEDLINE]

Caughan JP, Furukawa S, Jeevanandam V, Hefner CA, Kubo H, Margulies KB, McGowan BS, Mattiello JA, Dipla K, Piacentino V 3rd, Li S, Houser SR.



Sodium/calcium exchange contributes to contraction and relaxation in failed human ventricular myocytes.

Am J Physiol. 1999 Aug;277(2 Pt 2):H714-24.

PMID: 10444498 [PubMed - indexed for MEDLINE]

1230: Nofer JR, Pulawski E, Junker R, Seedorf U, Assmann G, Zidek W, Tepel M. Related Articles, Links

Na(+)/Ca(2+) exchange inhibitors modulate thapsigargin-induced Ca (2+) and Na(+) influx in human lymphocytes.

Int J Clin Lab Res. 1999;29(2):89-92.

PMID: 10436268 [PubMed - indexed for MEDLINE]

231: Maixent JM, Lelievre L, Berrebi-Bertrand I.

Related Articles, Links



Mechanism underlying the strong positive inotropic effects of LND-623: specific inhibition of Na, K-ATPase isoforms and exclusion of cellular sites of contractile control.

Cardiovasc Drugs Ther. 1998 Dec;12(6):585-94. PMID: 10410828 [PubMed - indexed for MEDLINE]

232: Blaustein MP, Lederer WJ.

Related Articles, Links



Sodium/calcium exchange: its physiological implications.

Physiol Rev. 1999 Jul;79(3):763-854. Review.

PMID: 10390518 [PubMed - indexed for MEDLINE]

<u>Van Gelder IC, Brundel BJ, Henning RH, Tuinenburg AE, Tieleman RG, Deelman L, Grandjean JG, De Kam PJ, Van Gilst WH, Crijns HJ.</u>

Related Articles, Links



Alterations in gene expression of proteins involved in the calcium handling in patients with atrial fibrillation.

J Cardiovasc Electrophysiol. 1999 Apr;10(4):552-60.

PMID: 10355697 [PubMed - indexed for MEDLINE]

234: Su Z, Bridge JH, Philipson KD, Spitzer KW, Barry WH.

Related Articles, Links



Quantitation of Na/Ca exchanger function in single ventricular myocytes.

J Mol Cell Cardiol. 1999 May;31(5):1125-35.

PMID: 10336850 [PubMed - indexed for MEDLINE]

1235: Owen VJ, Burton PB, Michel MC, Zolk O, Bohm M, Pepper JR, Barton PJ, Yacoub MH, Harding SE.

Related Articles, Links



Myocardial dysfunction in donor hearts. A possible etiology.

Circulation. 1999 May 18;99(19):2565-70.

PMID: 10330389 [PubMed - indexed for MEDLINE]

236: Egger M, Ruknudin A, Niggli E, Lederer WJ, Schulze DH. Related Articles, Links



Ni2+ transport by the human Na+/Ca2+ exchanger expressed in Sf9

Am J Physiol. 1999 May;276(5 Pt 1):C1184-92. PMID: 10329968 [PubMed - indexed for MEDLINE]

237: Cooper CB, Winkfein RJ, Szerencsei RT, Schnetkamp PP.

Related Articles, Links

cDNA cloning and functional expression of the dolphin retinal rod Na-Ca+K exchanger NCKX1: comparison with the functionally silent bovine NCKX1.

Biochemistry. 1999 May 11;38(19):6276-83.

PMID: 10320357 [PubMed - indexed for MEDLINE]

238: Schwinger RH, Wang J, Frank K, Muller-Ehmsen J, Brixius K, Related Articles, Links McDonough AA, Erdmann E.



Reduced sodium pump alpha1, alpha3, and beta1-isoform protein levels and Na+,K+-ATPase activity but unchanged Na+-Ca2+ exchanger protein levels in human heart failure.

Circulation. 1999 Apr 27;99(16):2105-12.

PMID: 10217649 [PubMed - indexed for MEDLINE]

239: Jornot L, Maechler P, Wollheim CB, Junod AF.

Related Articles, Links



Reactive oxygen metabolites increase mitochondrial calcium in endothelial cells: implication of the Ca2+/Na+ exchanger. J Cell Sci. 1999 Apr;112 (Pt 7):1013-22.

PMID: 10198283 [PubMed - indexed for MEDLINE]

240: Egger M, Ruknudin A, Lipp P, Kofuji P, Lederer WJ, Schulze Related Articles, Links DH, Niggli E.



Functional expression of the human cardiac Na+/Ca2+ exchanger in Sf9 cells: rapid and specific Ni2+ transport.

Cell Calcium. 1999 Jan;25(1):9-17.

PMID: 10191956 [PubMed - indexed for MEDLINE]

☐ **241**: <u>Guerini D.</u>

Related Articles, Links



The Ca2+ pumps and the Na+/Ca2+ exchangers.

Biometals. 1998 Dec;11(4):319-30. Review.

PMID: 10191496 [PubMed - indexed for MEDLINE]

242: Iwamoto T, Nakamura TY, Pan Y, Uehara A, Imanaga I, Shigekawa M.

Related Articles, Links



Unique topology of the internal repeats in the cardiac Na+/Ca2+ exchanger.

FEBS Lett. 1999 Mar 12;446(2-3):264-8.

PMID: 10100855 [PubMed - indexed for MEDLINE]

☐ 243: Kim HS, Lee JH, Suh YH.

Related Articles, Links



C-terminal fragment of Alzheimer's amyloid precursor protein inhibits sodium/calcium exchanger activity in SK-N-SH cell.

Neuroreport. 1999 Jan 18;10(1):113-6.

PMID: 10094144 [PubMed - indexed for MEDLINE]

□ 244:	Mochizuki S, Jiang C.	Related Articles, Links
	Na+/Ca++ exchanger and myocardial ischemia/repert Jpn Heart J. 1998 Nov;39(6):707-14. PMID: 10089932 [PubMed - indexed for MEDLINE]	fusion.
□ 245:	Egger M, Niggli E.	Related Articles, Links
	Regulatory function of Na-Ca exchange in the heart: a outlook.	milestones and
	J Membr Biol. 1999 Mar 15;168(2):107-30. Review. No abstrac PMID: 10089232 [PubMed - indexed for MEDLINE]	t available.
□ 246:	DiPolo R, Beauge L.	Related Articles, Links
	Metabolic pathways in the regulation of invertebrate a Na+/Ca2+ exchange. Biochim Biophys Acta. 1999 Feb 25;1422(1):57-71. Review. No PMID: 10082981 [PubMed - indexed for MEDLINE]	
□ 247:	Winslow RL, Rice J, Jafri S, Marban E, O'Rourke B.	Related Articles, Links
	Mechanisms of altered excitation-contraction couplin tachycardia-induced heart failure, II: model studies. Circ Res. 1999 Mar 19;84(5):571-86. PMID: 10082479 [PubMed - indexed for MEDLINE]	g in canine
□ 248:	O'Rourke B, Kass DA, Tomaselli GF, Kaab S, Tunin R, Marban E.	Related Articles, Links
	Mechanisms of altered excitation-contraction couplin tachycardia-induced heart failure, I: experimental studies Circ Res. 1999 Mar 19;84(5):562-70. PMID: 10082478 [PubMed - indexed for MEDLINE]	
□ 249:	Li XF, Lytton J.	Related Articles, Links
	A circularized sodium-calcium exchanger exon 2 tran J Biol Chem. 1999 Mar 19;274(12):8153-60. PMID: 10075718 [PubMed - indexed for MEDLINE]	script.
□ 250:	Marin J, Encabo A, Briones A, Garcia-Cohen EC, Alonso MJ.	Related Articles, Links
	Mechanisms involved in the cellular calcium homeosysmooth muscle: calcium pumps. Life Sci. 1999;64(5):279-303. Review. PMID: 10072189 [PubMed - indexed for MEDLINE]	tasis in vascular
□ 251:	Dipla K, Mattiello JA, Margulies KB, Jeevanandam V, Houser SR.	Related Articles, Links
	The sarcoplasmic reticulum and the Na+/Ca2+ excharcontribute to the Ca2+ transient of failing human vent Circ Res. 1999 Mar 5;84(4):435-44. PMID: 10066678 [PubMed - indexed for MEDLINE]	
□ 252:	Hasenfuss G, Schillinger W, Lehnart SE, Preuss M, Pieske B, Maier LS, Prestle J, Minami K, Just H.	Related Articles, Links
	Relationship between Na+-Ca2+-exchanger protein lefunction of failing human myocardium. Circulation. 1999 Feb 9;99(5):641-8. PMID: 9950661 [PubMed - indexed for MEDLINE]	evels and diastolic

□ 253:	Loeffler KU, Mangini NJ.	Related Articles, Links
	Immunohistochemical localization of Na+/Ca2+ exch retina and retinal pigment epithelium. Graefes Arch Clin Exp Ophthalmol. 1998 Dec;236(12):929-33. PMID: 9865624 [PubMed - indexed for MEDLINE]	anger in human
□ 254:	<u>Tucker JE, Winkfein RJ, Murthy SK, Friedman JS, Walter MA, Demetrick DJ, Schnetkamp PP.</u>	Related Articles, Links
	Chromosomal localization and genomic organization retinal rod Na-Ca+K exchanger. Hum Genet. 1998 Oct;103(4):411-4. PMID: 9856482 [PubMed - indexed for MEDLINE]	of the human
□ 255:	Tomiyama Y, Shiraga M, Kinoshita S, Ambo H, Kurata Y, Matsuzawa Y, Kunicki TJ.	Related Articles, Links
	A Glanzmann thrombasthenia-like phenotype caused inside-out signaling through the integrin alpha(IIb)bet Thromb Haemost. 1998 Nov;80(5):735-42. PMID: 9843164 [PubMed - indexed for MEDLINE]	•
□ 256:	Schillinger W, Lehnart SE, Prestle J, Preuss M, Pieske B, Maier LS, Meyer M, Just H, Hasenfuss G.	Related Articles, Links
	Influence of SR Ca(2+)-ATPase and Na(+)-Ca(2+)-exforce-frequency relation. Basic Res Cardiol. 1998;93 Suppl 1:38-45. Review. PMID: 9833129 [PubMed - indexed for MEDLINE]	changer on the
□ 257:	Horiguchi M, Kimura M, Skurnick J, Aviv A.	Related Articles, Links
	Parameters of lymphocyte Na+-Ca2+ regulation and beginder effect. Hypertension. 1998 Nov;32(5):869-74. PMID: 9822446 [PubMed - indexed for MEDLINE]	plood pressure: the
□ 258:	Shiraga M, Tomiyama Y, Honda S, Suzuki H, Kosugi S, Tadokoro S, Kanakura Y, Tanoue K, Kurata Y, Matsuzawa Y.	Related Articles, Links
	Involvement of Na+/Ca2+ exchanger in inside-out sig platelet integrin IIbbeta3. Blood. 1998 Nov 15;92(10):3710-20. PMID: 9808565 [PubMed - indexed for MEDLINE]	naling through the
□ 259:	Foster RH, Prat H, Rothman I.	Related Articles, Links
	Is ouabain produced by the adrenal gland? Gen Pharmacol. 1998 Oct;31(4):499-501. Review. PMID: 9792206 [PubMed - indexed for MEDLINE]	
□ 260:	Mikoshiba K.	Related Articles, Links
	[Ca2+ mobilization and pumping out mechanism] Tanpakushitsu Kakusan Koso. 1998 Sep;43(12 Suppl):1577-8. R abstract available. PMID: 9788155 [PubMed - indexed for MEDLINE]	eview. Japanese. No
□ 261:	Matsuoka S, Noma A.	Related Articles, Links
	[Na(+)-Ca2+ exchange] Tanpakushitsu Kakusan Koso. 1998 Sep;43(12 Suppl):1555-60.	Review. Japanese. No

PMID: 9788152 [PubMed - indexed for MEDLINE] ☐ 262: Winslow RL, Rice J, Jafri S. Related Articles, Links Modeling the cellular basis of altered excitation-contraction coupling in heart failure. Prog Biophys Mol Biol. 1998;69(2-3):497-514. Review. PMID: 9785953 [PubMed - indexed for MEDLINE] 263: Fukuba Y, Makino S, Takeda Y, Kawashima J, Murakami H, Related Articles, Links Miura A. The effect of high-salt diet intake on muscular exercise ability in young Japanese women. Appl Human Sci. 1998 Jul;17(4):145-8. PMID: 9757602 [PubMed - indexed for MEDLINE] 264: Fang Y, Rong M, He L, Zhou C. Related Articles, Links Mode-actions of the Na(+)-Ca2+ exchanger: from genes to mechanisms to a new strategy in brain disorders. Biomed Pharmacother. 1998;52(4):145-56. PMID: 9755808 [PubMed - indexed for MEDLINE] 265: Courtemanche M, Ramirez RJ, Nattel S. Related Articles, Links Ionic mechanisms underlying human atrial action potential properties: insights from a mathematical model. Am J Physiol. 1998 Jul;275(1 Pt 2):H301-21. PMID: 9688927 [PubMed - indexed for MEDLINE] **266:** Iwamoto T, Shigekawa M. Related Articles, Links Differential inhibition of Na+/Ca2+ exchanger isoforms by divalent cations and isothiourea derivative. Am J Physiol. 1998 Aug;275(2 Pt 1):C423-30. PMID: 9688596 [PubMed - indexed for MEDLINE] **267:** Pieske B. Related Articles, Links New aspects of the pathophysiology of heart failure Wien Med Wochenschr. 1998;148(5):108-20. Review. German. PMID: 9654696 [PubMed - indexed for MEDLINE] 268: Itoh T, Itoh A, Horiuchi K, Pleasure D. Related Articles, Links AMPA receptor-mediated excitotoxicity in human NT2-N neurons results from loss of intracellular Ca2+ homeostasis following marked elevation of intracellular Na+. J Neurochem. 1998 Jul;71(1):112-24. PMID: 9648857 [PubMed - indexed for MEDLINE] ☐ 269: Priebe L, Beuckelmann DJ. Related Articles, Links Simulation study of cellular electric properties in heart failure. Circ Res. 1998 Jun 15;82(11):1206-23. PMID: 9633920 [PubMed - indexed for MEDLINE] 270: Carrillo C, Cafferata EG, Genovese J, O'Reilly M, Roberts AB, Related Articles, Links Santa-Coloma TA. TGF-betal up-regulates the mRNA for the Na+/Ca2+ exchanger in neonatal rat cardiac myocytes. Cell Mol Biol (Noisy-le-grand). 1998 May;44(3):543-51.

PMID: 9620452 [PubMed - indexed for MEDLINE] ☐ 271: Mattiello JA, Margulies KB, Jeevanandam V, Houser SR. Related Articles, Links Contribution of reverse-mode sodium-calcium exchange to contractions in failing human left ventricular myocytes. Cardiovasc Res. 1998 Feb;37(2):424-31. PMID: 9614497 [PubMed - indexed for MEDLINE] 272: Cook O, Low W, Rahamimoff H. Related Articles, Links Membrane topology of the rat brain Na+-Ca2+ exchanger. Biochim Biophys Acta. 1998 Apr 22;1371(1):40-52. PMID: 9565655 [PubMed - indexed for MEDLINE] ☐ **273**: Endoh M. Related Articles, Links Changes in intracellular Ca2+ mobilization and Ca2+ sensitization as mechanisms of action of physiological interventions and inotropic agents in intact myocardial cells. Jpn Heart J. 1998 Jan;39(1):1-44. Review. PMID: 9601480 [PubMed - indexed for MEDLINE] 1274: Dyck C, Maxwell K, Buchko J, Trac M, Omelchenko A, Related Articles, Links Hnatowich M, Hryshko LV. Structure-function analysis of CALX1.1, a Na+-Ca2+ exchanger from Drosophila. Mutagenesis of ionic regulatory sites. J Biol Chem. 1998 May 22;273(21):12981-7. PMID: 9582332 [PubMed - indexed for MEDLINE] **275:** Kiang JG, Ding XZ, McClain DE. Related Articles, Links Overexpression of HSP-70 attenuates increases in [Ca2+]i and protects human epidermoid A-431 cells after chemical hypoxia. Toxicol Appl Pharmacol. 1998 Apr;149(2):185-94. PMID: 9571987 [PubMed - indexed for MEDLINE] ☐ 276: Friedman PA. Related Articles, Links Codependence of renal calcium and sodium transport. Annu Rev Physiol. 1998;60:179-97. Review. PMID: 9558460 [PubMed - indexed for MEDLINE] ☐ 277: Matsuda T, Baba A. Related Articles, Links [Response of Na+/Ca2+ antiporter to ischemia and glial/neuronal death] Nippon Yakurigaku Zasshi. 1998 Jan;111(1):13-9. Review. Japanese. PMID: 9551468 [PubMed - indexed for MEDLINE] 278: Jones LR, Suzuki YJ, Wang W, Kobayashi YM, Ramesh V, Related Articles, Links Franzini-Armstrong C, Cleemann L, Morad M. Regulation of Ca2+ signaling in transgenic mouse cardiac myocytes overexpressing calsequestrin. J Clin Invest. 1998 Apr 1;101(7):1385-93. PMID: 9525981 [PubMed - indexed for MEDLINE] 279: Scheller T, Kraev A, Skinner S, Carafoli E. Related Articles, Links Cloning of the multipartite promoter of the sodium-calcium exchanger gene NCX1 and characterization of its activity in vascular smooth muscle cells. J Biol Chem. 1998 Mar 27;273(13):7643-9.

PMID: 9516469 [PubMed - indexed for MEDLINE] 280: Berberian G, Hidalgo C, DiPolo R, Beauge L. Related Articles, Links ATP stimulation of Na+/Ca2+ exchange in cardiac sarcolemmal vesicles. Am J Physiol. 1998 Mar;274(3 Pt 1):C724-33. PMID: 9530104 [PubMed - indexed for MEDLINE] ☐ 281: Satoh H, Sperelakis N. Related Articles, Links Review of some actions of taurine on ion channels of cardiac muscle cells and others. Gen Pharmacol. 1998 Apr;30(4):451-63. Review. PMID: 9522160 [PubMed - indexed for MEDLINE] **282:** Watano T, Kimura J. Related Articles, Links Calcium-dependent inhibition of the sodium-calcium exchange current by KB-R7943. Can J Cardiol. 1998 Feb;14(2):259-62. PMID: 9520863 [PubMed - indexed for MEDLINE] **1283:** Tucker JE, Winkfein RJ, Cooper CB, Schnetkamp PP. Related Articles, Links cDNA cloning of the human retinal rod Na-Ca + K exchanger: comparison with a revised bovine sequence. Invest Ophthalmol Vis Sci. 1998 Feb;39(2):435-40. PMID: 9478004 [PubMed - indexed for MEDLINE] 1284: Mangini NJ, Haugh-Scheidt L, Valle JE, Cragoe EJ Jr, Ripps H, Related Articles, Links Kennedy BG. Sodium-calcium exchanger in cultured human retinal pigment epithelium. Exp Eye Res. 1997 Dec;65(6):821-34. PMID: 9441706 [PubMed - indexed for MEDLINE] ☐ 285: Aviv A. Related Articles, Links Cellular calcium and sodium regulation, salt-sensitivity and essential hypertension in African Americans. Ethn Health. 1996 Sep;1(3):275-81. Review. PMID: 9395572 [PubMed - indexed for MEDLINE] 286: Schwinger RH, Brixius K, Bavendiek U, Hoischen S, Muller-Related Articles, Links Ehmsen J, Bolck B, Erdmann E. Effect of cyclopiazonic acid on the force-frequency relationship in human nonfailing myocardium. J Pharmacol Exp Ther. 1997 Oct;283(1):286-92. PMID: 9336335 [PubMed - indexed for MEDLINE] ☐ 287: Morad M, Suzuki YJ. Related Articles, Links Ca(2+)-signaling in cardiac myocytes: evidence from evolutionary and transgenic models. Adv Exp Med Biol. 1997;430:3-12. Review. PMID: 9330714 [PubMed - indexed for MEDLINE] 288: Wu A, Derrico CA, Hatem L, Colvin RA. Related Articles, Links Alzheimer's amyloid-beta peptide inhibits sodium/calcium exchange

	measured in rat and human brain plasma membrane v Neuroscience. 1997 Oct;80(3):675-84. PMID: 9276485 [PubMed - indexed for MEDLINE]	vesicles.
□ 289	Ruknudin A, Valdivia C, Kofuji P, Lederer WJ, Schulze DH.	Related Articles, Links
	Na+/Ca2+ exchanger in Drosophila: cloning, express differences. Am J Physiol. 1997 Jul;273(1 Pt 1):C257-65. PMID: 9252464 [PubMed - indexed for MEDLINE]	sion, and transport
□ 290	Navanglone A, Rispoli G, Gabellini N, Carafoli E.	Related Articles, Links
	Electrophysiological characterization of ionic transposexchanger expressed in human embryonic kidney cel Biophys J. 1997 Jul;73(1):45-51. PMID: 9199770 [PubMed - indexed for MEDLINE]	
□ 291	Levi AJ, Dalton GR, Hancox JC, Mitcheson JS, Issberner J, Bates JA, Evans SJ, Howarth FC, Hobai IA, Jones JV.	Related Articles, Links
	Role of intracellular sodium overload in the genesis of arrhythmias. J Cardiovasc Electrophysiol. 1997 Jun;8(6):700-21. Review. PMID: 9209972 [PubMed - indexed for MEDLINE]	of cardiac
□ 292	Matsuda T, Takuma K, Baba A.	Related Articles, Links
	Na(+)-Ca2+ exchanger: physiology and pharmacolog Jpn J Pharmacol. 1997 May;74(1):1-20. Review. PMID: 9195292 [PubMed - indexed for MEDLINE]	gy.
□ 293	Muller-Ehmsen J, Frank K, Brixius K, Schwinger RH.	Related Articles, Links
	Increase in force of contraction by activation of the Nexchanger in human myocardium. Br J Clin Pharmacol. 1997 Apr;43(4):399-405. PMID: 9146852 [PubMed - indexed for MEDLINE]	Va+/Ca(2+)-
□ 294	LoPachin RM, Lehning EJ.	Related Articles, Links
	Mechanism of calcium entry during axon injury and Toxicol Appl Pharmacol. 1997 Apr;143(2):233-44. Review. PMID: 9144441 [PubMed - indexed for MEDLINE]	degeneration.
□ 295	Resendes MC, Kalogeros GC, Dixon SJ, Philp RB.	Related Articles, Links
	Nitrous oxide enhances Na+/Ca++ exchange in the n line SK-N-SH. J Pharmacol Exp Ther. 1997 Feb;280(2):795-801. PMID: 9023293 [PubMed - indexed for MEDLINE]	euroblastoma cell
□ 296	Foey AD, Crawford A, Hall ND.	Related Articles, Links
	Modulation of cytokine production by human monon following impairment of Na, K-ATPase activity. Biochim Biophys Acta. 1997 Jan 10;1355(1):43-9. PMID: 9030200 [PubMed - indexed for MEDLINE]	uclear cells
□ 297 :	Studer R, Reinecke H, Vetter R, Holtz J, Drexler H.	Related Articles, Links
	Expression and function of the cardiac Na+/Ca2+ exc development of the rat, in experimental-induced card	-

and in the failing human heart. Basic Res Cardiol. 1997;92 Suppl 1:53-8. Review. PMID: 9202844 [PubMed - indexed for MEDLINE] ☐ 298: Hryshko LV, Philipson KD. Related Articles, Links Sodium-calcium exchange: recent advances. ||≡| Basic Res Cardiol. 1997;92 Suppl 1:45-51. Review. PMID: 9202843 [PubMed - indexed for MEDLINE] ☐ **299**: Pitt A, Knox AJ. Related Articles, Links Molecular characterization of the human airway smooth muscle = Na+/Ca2+ exchanger. Am J Respir Cell Mol Biol. 1996 Dec; 15(6):726-30. PMID: 8969266 [PubMed - indexed for MEDLINE] 300: Brandenburger Y, Kennedy ED, Python CP, Rossier MF, Related Articles, Links Vallotton MB, Wollheim CB, Capponi AM. Possible role for mitochondrial calcium in angiotensin II- and potassium-stimulated steroidogenesis in bovine adrenal glomerulosa cells. Endocrinology. 1996 Dec;137(12):5544-51. PMID: 8940382 [PubMed - indexed for MEDLINE] 301: White KE, Gesek FA, Friedman PA. Related Articles, Links Na+/Ca2+ exchange in rat osteoblast-like UMR 106 cells. |=| J Bone Miner Res. 1996 Nov;11(11):1666-75. PMID: 8915774 [PubMed - indexed for MEDLINE] 302: Kraev A, Chumakov I, Carafoli E. Related Articles, Links The organization of the human gene NCX1 encoding the sodium-calcium exchanger. Genomics. 1996 Oct 1;37(1):105-12. PMID: 8921376 [PubMed - indexed for MEDLINE] 1303: Shiraga M, Tomiyama Y, Honda S, Kashiwagi H, Kosugi S, Related Articles, Links Handa M, Ikeda Y, Kanakura Y, Kurata Y, Matsuzawa Y. Affinity modulation of the platelet integrin alpha IIb beta 3 by alphachymotrypsin: a possible role for Na+/Ca2+ exchanger. Blood. 1996 Oct 1;88(7):2594-602. PMID: 8839852 [PubMed - indexed for MEDLINE] ☐ 304: Wang J, Schwinger RH, Frank K, Muller-Ehmsen J, Martin-Related Articles, Links Vasallo P, Pressley TA, Xiang A, Erdmann E, McDonough AA. Regional expression of sodium pump subunits isoforms and Na+-Ca++ exchanger in the human heart. J Clin Invest. 1996 Oct 1;98(7):1650-8. PMID: 8833915 [PubMed - indexed for MEDLINE] 305: Benardeau A, Hatem SN, Rucker-Martin C, Le Grand B, Mace Related Articles, Links L, Dervanian P, Mercadier JJ, Coraboeuf E. Contribution of Na+/Ca2+ exchange to action potential of human atrial myocytes. Am J Physiol. 1996 Sep;271(3 Pt 2):H1151-61. PMID: 8853354 [PubMed - indexed for MEDLINE] ☐ 306: Flesch M, Schwinger RH, Schiffer F, Frank K, Sudkamp M, Related Articles, Links

	Kuhn-Regnier F, Arnold G, Bohm M.	
	Evidence for functional relevance of an enhanced exp (+)-Ca2+ exchanger in failing human myocardium. Circulation. 1996 Sep 1;94(5):992-1002. PMID: 8790037 [PubMed - indexed for MEDLINE]	pression of the Na
□ 307:	Gabellini N, Zatti A, Rispoli G, Navangione A, Carafoli E.	Related Articles, Links
	Expression of an active Na+/Ca2+ exchanger isoform terminal transmembrane segments. Eur J Biochem. 1996 Aug 1;239(3):897-904. PMID: 8774741 [PubMed - indexed for MEDLINE]	lacking the six C-
□ 308:	Janvier NC, Boyett MR.	Related Articles, Links
	The role of Na-Ca exchange current in the cardiac act Cardiovasc Res. 1996 Jul;32(1):69-84. Review. PMID: 8776405 [PubMed - indexed for MEDLINE]	ion potential.
□ 309:	<u>Lederer WJ, He S, Luo S, duBell W, Kofuji P, Kieval R, Neubauer CF, Ruknudin A, Cheng H, Cannell MB, Rogers TB, Schulze DH.</u>	Related Articles, Links
	The molecular biology of the Na(+)-Ca2+ exchanger roles in heart, smooth muscle cells, neurons, glia, lymnonexcitable cells. Ann N Y Acad Sci. 1996 Apr 15;779:7-17. Review. No abstract PMID: 8659882 [PubMed - indexed for MEDLINE]	phocytes, and
□310:	Reinecke H, Studer R, Vetter R, Just H, Holtz J, Drexler H.	Related Articles, Links
	Role of the cardiac sarcolemmal Na(+)-Ca2+ exchange human heart failure. Ann N Y Acad Sci. 1996 Apr 15;779:543-5. No abstract availab PMID: 8659875 [PubMed - indexed for MEDLINE]	Š
□311:	Flesch M, Putz F, Schwinger RH, Bohm M.	Related Articles, Links
	Functional relevance of an enhanced expression of the exchanger in the failing human heart. Ann N Y Acad Sci. 1996 Apr 15;779:539-42. No abstract availa PMID: 8659874 [PubMed - indexed for MEDLINE]	,
□ 312:	Li GR, Nattel S.	Related Articles, Links
	Demonstration of an inward Na(+)-Ca2+ exchange cuhuman atrial myocytes. Ann N Y Acad Sci. 1996 Apr 15;779:525-8. No abstract availab PMID: 8659869 [PubMed - indexed for MEDLINE]	-
□313:	Gardner JP, Balasubramanyam M.	Related Articles, Links
	Na-Ca exchange in circulating blood cells. Ann N Y Acad Sci. 1996 Apr 15;779:502-14. Review. PMID: 8659866 [PubMed - indexed for MEDLINE]	
□ 314:	Schulze DH, Kofuji P, Valdivia C, He S, Luo S, Ruknudin A, Wisel S, Kirby MS, duBell W, Lederer WJ.	Related Articles, Links
	Alternative splicing of the Na(+)-Ca2+ exchanger gen Ann N Y Acad Sci. 1996 Apr 15;779:46-57. Review. PMID: 8659862 [PubMed - indexed for MEDLINE]	e, NCX1.

□ 315:	Langer GA, Peskoff A.	Related Articles, Links
	Calcium in the cardiac diadic cleft. Implications for seexchange.	odium-calcium
	Ann N Y Acad Sci. 1996 Apr 15;779:408-16. Review. No abstra PMID: 8659857 [PubMed - indexed for MEDLINE]	act available.
□316:	Rahamimoff H, Low W, Cook O, Furman I, Kasir J, Vatashski R.	Related Articles, Links
	The structural basis of Na(+)-Ca2+ exchange activity Ann N Y Acad Sci. 1996 Apr 15;779:29-36. Review. No abstract PMID: 8659840 [PubMed - indexed for MEDLINE]	
□ 317:	Gabellini N, Iwata T, Carafoli E.	Related Articles, Links
	Expression of Na(+)-Ca2+ exchanger with modified (hydrophobic domains and enhanced activity. Ann N Y Acad Sci. 1996 Apr 15;779:110-4. Review. PMID: 8659816 [PubMed - indexed for MEDLINE]	C-terminal
□ 318:	Kraev A, Chumakov I, Carafoli E.	Related Articles, Links
	Molecular biological studies of the cardiac sodium-ca Ann N Y Acad Sci. 1996 Apr 15;779:103-9. Review. PMID: 8659815 [PubMed - indexed for MEDLINE]	lcium exchanger.
□ 319:	[No authors listed]	Related Articles, Links
	3rd International Conference on Sodium-Calcium Exc Hole, Massachusetts, April 23-26, 1995. Proceedings Ann N Y Acad Sci. 1996 Apr 15;779:1-589. No abstract availab PMID: 8659814 [PubMed - indexed for MEDLINE]	•
□ 320:	Just H.	Related Articles, Links
	Pathophysiological targets for beta-blocker therapy in failure. Eur Heart J. 1996 Apr;17 Suppl B:2-7. PMID: 8733064 [PubMed - indexed for MEDLINE]	congestive heart
□ 321:	Colvin RA, Walker JP, Schummers J, Davis N.	Related Articles, Links
	Aging does not affect steady-state expression of the Nexchanger in rat brain. Cell Mol Neurobiol. 1996 Feb;16(1):11-9. PMID: 8714556 [PubMed - indexed for MEDLINE]	Ja+/Ca2+
□ 322:	Drexler H.	Related Articles, Links
	[Sympathetic nervous system in heart failure: effect of and nitric oxide] Z Kardiol. 1996;85 Suppl 6:247-52. Review. German. PMID: 9064972 [PubMed - indexed for MEDLINE]	f catecholamines
□ 323:	Capponi AM.	Related Articles, Links
	Distribution and signal transduction of angiotensin II receptors. Blood Press Suppl. 1996;2:41-6. Review. PMID: 8913539 [PubMed - indexed for MEDLINE]	AT1 and AT2
□ 324:	Sham JS, Hatem SN, Morad M.	Related Articles, Links

Species differences in the activity of the Na(+)-Ca2+ exchanger in mammalian cardiac myocytes. J Physiol. 1995 Nov 1;488 (Pt 3):623-31. PMID: 8576853 [PubMed - indexed for MEDLINE] 325: Loo TW, Ho C, Clarke DM. Related Articles, Links Expression of a functionally active human renal sodium-calcium exchanger lacking a signal sequence. J Biol Chem. 1995 Aug 18;270(33):19345-50. PMID: 7642612 [PubMed - indexed for MEDLINE] 326: Furman I, Cook O, Kasir J, Low W, Rahamimoff H. Related Articles, Links The putative amino-terminal signal peptide of the cloned rat brain Na (+)-Ca2+ exchanger gene (RBE-1) is not mandatory for functional expression. J Biol Chem. 1995 Aug 11;270(32):19120-7. PMID: 7642578 [PubMed - indexed for MEDLINE] 327: Lipp P, Schwaller B, Niggli E. Related Articles, Links Specific inhibition of Na-Ca exchange function by antisense oligodeoxynucleotides. FEBS Lett. 1995 May 8;364(2):198-202. Erratum in: FEBS Lett 1995 Aug 21;370 PMID: 7750570 [PubMed - indexed for MEDLINE] 328: Gabellini N, Iwata T, Carafoli E. Related Articles, Links An alternative splicing site modifies the carboxyl-terminal transmembrane domains of the Na+/Ca2+ exchanger. J Biol Chem. 1995 Mar 24;270(12):6917-24. PMID: 7896841 [PubMed - indexed for MEDLINE] 329: Kordeli E, Lambert S, Bennett V. Related Articles, Links AnkyrinG. A new ankyrin gene with neural-specific isoforms localized at the axonal initial segment and node of Ranvier. J Biol Chem. 1995 Feb 3;270(5):2352-9. PMID: 7836469 [PubMed - indexed for MEDLINE] 330: Gatto C, Hale CC, Xu W, Milanick MA. Related Articles, Links Eosin, a potent inhibitor of the plasma membrane Ca pump, does not inhibit the cardiac Na-Ca exchanger. Biochemistry. 1995 Jan 24;34(3):965-72. PMID: 7530047 [PubMed - indexed for MEDLINE] 331: Morishita F, Kawarabayashi T, Sakamoto Y, Shirakawa K. Related Articles, Links Role of the sodium-calcium exchange mechanism and the effect of magnesium on sodium-free and high-potassium contractures in pregnant human myometrium. Am J Obstet Gynecol. 1995 Jan;172(1 Pt 1):186-95. PMID: 7847532 [PubMed - indexed for MEDLINE] ☐ **332:** Fisher DJ. Related Articles, Links Recent insights into the regulation of cardiac Ca2+ flux during perinatal development and in cardiac failure. Curr Opin Cardiol. 1995 Jan;10(1):44-51. Review.

PMID: 7787264 [PubMed - indexed for MEDLINE] ☐ 333: Michaelis ML. Related Articles, Links Ion transport systems and Ca2+ regulation in aging neurons. Ann N Y Acad Sci. 1994 Dec 15;747:407-18. Review. No abstract available. PMID: 7847687 [PubMed - indexed for MEDLINE] 334: Colvin RA, Davis N, Wu A, Murphy CA, Levengood J. Studies of the mechanism underlying increased Na+/Ca2+ exchange activity in Alzheimer's disease brain. Brain Res. 1994 Dec 5;665(2):192-200. PMID: 7895054 [PubMed - indexed for MEDLINE] ☐ 335: Wu A, Colvin RA. Related Articles, Links Characterization of exchange inhibitory peptide effects on Na+/Ca2+ exchange in rat and human brain plasma membrane vesicles. J Neurochem. 1994 Dec;63(6):2136-43. PMID: 7964733 [PubMed - indexed for MEDLINE] ☐ 336: Suleiman MS. Related Articles, Links New concepts in the cardioprotective action of magnesium and taurine during the calcium paradox and ischaemia of the heart. Magnes Res. 1994 Dec;7(3-4):295-312. Review. PMID: 7786694 [PubMed - indexed for MEDLINE] 337: Balasubramanyam M, Rohowsky-Kochan C, Reeves JP, Related Articles, Links Gardner JP. Na+/Ca2+ exchange-mediated calcium entry in human lymphocytes. J Clin Invest. 1994 Nov;94(5):2002-8. PMID: 7962546 [PubMed - indexed for MEDLINE] 338: Reeves JP, Condrescu M, Chernaya G, Gardner JP. Related Articles, Links Na+/Ca2+ antiport in the mammalian heart. J Exp Biol. 1994 Nov;196:375-88. Review. PMID: 7823035 [PubMed - indexed for MEDLINE] ☐ 339: Grinstein S. Wieczorek H. Related Articles, Links Cation antiports of animal plasma membranes. J Exp Biol. 1994 Nov;196:307-18. Review. No abstract available. PMID: 7823030 [PubMed - indexed for MEDLINE] ☐ 340: Kim-Lee MH, Stokes BT, McDonald JS. Related Articles, Links Procaine, lidocaine, and hypothermia inhibit calcium paradox in glial cells. Anesth Analg. 1994 Oct;79(4):728-33. PMID: 7943783 [PubMed - indexed for MEDLINE] 341: Benders AA, Li J, Lock RA, Bindels RJ, Bonga SE, Veerkamp Related Articles, Links Copper toxicity in cultured human skeletal muscle cells: the Ē involvement of Na+/K(+)-ATPase and the Na+/Ca(2+)-exchanger. Pflugers Arch. 1994 Oct;428(5-6):461-7. PMID: 7838667 [PubMed - indexed for MEDLINE] 342: Atsma DE, Bastiaanse EM, Ince C, van der Laarse A. Related Articles, Links

	A novel two-compartment culture dish allows micros two different treatments in one cell culture simultane external pH on Na+/Ca2+ exchanger activity in cultucardiomyocytes. Pflugers Arch. 1994 Oct;428(3-4):296-9. PMID: 7816552 [PubMed - indexed for MEDLINE]	ously. Influence of
□ 343	Studer R, Reinecke H, Bilger J, Eschenhagen T, Bohm M, Hasenfuss G, Just H, Holtz J, Drexler H.	Related Articles, Links
	Gene expression of the cardiac Na(+)-Ca2+ exchange human heart failure. Circ Res. 1994 Sep;75(3):443-53. PMID: 8062418 [PubMed - indexed for MEDLINE]	er in end-stage
□ 344	Harvey BJ.	Related Articles, Links
	Crosstalk and epithelial ion transport. Curr Opin Nephrol Hypertens. 1994 Sep;3(5):523-8. PMID: 7804751 [PubMed - indexed for MEDLINE]	
□ 345	Kimura M, Cho JH, Reeves JP, Aviv A.	Related Articles, Links
	Inhibition of Ca2+ entry by Ca2+ overloading of intr stores in human platelets. J Physiol. 1994 Aug 15;479 (Pt 1):1-10. PMID: 7527459 [PubMed - indexed for MEDLINE]	acellular Ca2+
□ 346	Lax D, Martinez-Zaguilan R, Gillies RJ.	Related Articles, Links
	Furazolidone increases thapsigargin-sensitive Ca(2+) cardiac myocytes. Am J Physiol. 1994 Aug;267(2 Pt 2):H734-41. PMID: 8067429 [PubMed - indexed for MEDLINE]	-ATPase in chick
□ 347	Reithmeier RA.	Related Articles, Links
	Mammalian exchangers and co-transporters. Curr Opin Cell Biol. 1994 Aug;6(4):583-94. Review. PMID: 7986536 [PubMed - indexed for MEDLINE]	
□ 348	Hoey A, Amos GJ, Ravens U.	Related Articles, Links
	Comparison of the action potential prolonging and potential prolonging and potential prolonging and potential of DPI 201-106 and BDF 9148 in human very myocardium. J Mol Cell Cardiol. 1994 Aug;26(8):985-94. PMID: 7799453 [PubMed - indexed for MEDLINE]	
□ 349	Kiang JG, Smallridge RC.	Related Articles, Links
	Sodium cyanide increases cytosolic free calcium: evi of the reversed mode of the Na+/Ca2+ exchanger and from inositol trisphosphate-insensitive pools. Toxicol Appl Pharmacol. 1994 Aug;127(2):173-81. PMID: 7519371 [PubMed - indexed for MEDLINE]	
□ 350	Loo TW, Clarke DM.	Related Articles, Links
	Functional expression of human renal Na+/Ca2+ exc cells. Am J Physiol. 1994 Jul;267(1 Pt 2):F70-4.	hanger in insect

	·	
	PMID: 8048567 [PubMed - indexed for MEDLINE]	
□351	Li Z, Matsuoka S, Hryshko LV, Nicoll DA, Bersohn MM, Burke EP, Lifton RP, Philipson KD.	Related Articles, Links
	Cloning of the NCX2 isoform of the plasma membrasexchanger. J Biol Chem. 1994 Jul 1;269(26):17434-9. PMID: 8021246 [PubMed - indexed for MEDLINE]	ne Na(+)-Ca2+
□ 352	: Drexler H.	Related Articles, Links
	Heart failure: an update on pathophysiology. Arch Mal Coeur Vaiss. 1994 Jun;87 Spec No 2:13-6. PMID: 7864717 [PubMed - indexed for MEDLINE]	
□353	: Macdonald RL, Weir BK.	Related Articles, Links
	Cerebral vasospasm and free radicals. Free Radic Biol Med. 1994 May;16(5):633-43. Review. PMID: 8026807 [PubMed - indexed for MEDLINE]	
□354	: Kimura M, Cho JH, Lasker N, Aviv A.	Related Articles, Links
	Differences in platelet calcium regulation between A and Caucasians: implications for the predisposition o Americans to essential hypertension. J Hypertens. 1994 Feb;12(2):199-207. PMID: 8021471 [PubMed - indexed for MEDLINE]	
□ 355	Tepel M, Bauer S, Kegel M, Raffelsiefer A, Wischniowski H, Zidek W.	Related Articles, Links
	Increased cytosolic free sodium in platelets from pati stage chronic renal failure. Nephrol Dial Transplant. 1994;9(1):27-34. PMID: 8177473 [PubMed - indexed for MEDLINE]	ents with early-
□ 356	: Levi AJ, Boyett MR, Lee CO.	Related Articles, Links
	The cellular actions of digitalis glycosides on the hear Prog Biophys Mol Biol. 1994;62(1):1-54. Review. No abstract a PMID: 8085015 [PubMed - indexed for MEDLINE]	
□ 357	: Cox DA, Matlib MA.	Related Articles, Links
	Modulation of intramitochondrial free Ca2+ concentral antagonists of Na(+)-Ca2+ exchange. Trends Pharmacol Sci. 1993 Nov;14(11):408-13. Review. PMID: 8296399 [PubMed - indexed for MEDLINE]	ration by
□ 358	Schulze D, Kofuji P, Hadley R, Kirby MS, Kieval RS, Doering A, Niggli E, Lederer WJ.	Related Articles, Links
	Sodium/calcium exchanger in heart muscle: molecula function, and its special role in excitation-contraction Cardiovasc Res. 1993 Oct;27(10):1726-34. Review. PMID: 8275517 [PubMed - indexed for MEDLINE]	
□ 359	: Noble D, Bett G.	Related Articles, Links
	Reconstructing the heart: a challenge for integrative particles are cardiovasc Res. 1993 Oct;27(10):1701-12. No abstract available PMID: 8275516 [PubMed - indexed for MEDLINE]	

□ 360:	Ishida T, Matsuura H, Ishida-Kainouchi M, Ozono R, Watanabe M, Kajiyama G, Oshima T.	Related Articles, Links
	Na(+)-Ca2+ exchange modulates Ca2+ handling of healtering intracellular Ca2+ store size. J Hypertens. 1993 Oct;11(10):1089-95. PMID: 8258673 [PubMed - indexed for MEDLINE]	uman platelets by
□ 361:	Marlier LN, Zheng T, Tang J, Grayson DR.	Related Articles, Links
	Regional distribution in the rat central nervous system encoding a portion of the cardiac sodium/calcium exc from cerebellar granule neurons. Brain Res Mol Brain Res. 1993 Oct;20(1-2):21-39. PMID: 8255180 [PubMed - indexed for MEDLINE]	
□ 362:	Donnadieu E, Trautmann A.	Related Articles, Links
	Is there a Na+/Ca2+ exchanger in macrophages and in Pflugers Arch. 1993 Sep;424(5-6):448-55. PMID: 8255728 [PubMed - indexed for MEDLINE]	n lymphocytes?
□ 363:	Mene P, Pugliese F, Cinotti GA.	Related Articles, Links
	Cyclic nucleotides inhibit Na+/Ca2+ exchange in cult mesangial cells. Exp Nephrol. 1993 Jul-Aug;1(4):245-52. PMID: 7521769 [PubMed - indexed for MEDLINE]	ured human
□ 364:	Barry WH.	Related Articles, Links
	Is "fuzzy space" necessary for Ca2+ extrusion on the exchanger in cardiac myocytes? J Mol Cell Cardiol. 1993 Jun;25(6):641-3; discussion 645-6. No PMID: 8411189 [PubMed - indexed for MEDLINE]	` ,
□ 365:	Langer GA, Peskoff A, Post JA.	Related Articles, Links
	How does the Na(+)-Ca2+ exchanger work in the inta J Mol Cell Cardiol. 1993 Jun;25(6):637-9. No abstract available. PMID: 8411188 [PubMed - indexed for MEDLINE]	
□ 366:	Katnik C, Nelson DJ.	Related Articles, Links
	Platelet activating factor-induced increase in cytosolic transmembrane current in human macrophages. J Membr Biol. 1993 Jun;134(3):213-24. PMID: 8411123 [PubMed - indexed for MEDLINE]	calcium and
□ 367:	Barry WH, Bridge JH.	Related Articles, Links
	Intracellular calcium homeostasis in cardiac myocytes Circulation. 1993 Jun;87(6):1806-15. Review. PMID: 8389258 [PubMed - indexed for MEDLINE]	3.
□ 368:	Kimura M, Aviv A, Reeves JP.	Related Articles, Links
₩≣	K(+)-dependent Na+/Ca2+ exchange in human platele J Biol Chem. 1993 Apr 5;268(10):6874-7. PMID: 8463216 [PubMed - indexed for MEDLINE]	ets.
□ 369:	Pijuan V, Zhuang Y, Smith L, Kroupis C, Condrescu M, Aceto JF, Reeves JP, Smith JB.	Related Articles, Links

	Stable expression of the cardiac sodium-calcium exch cells. Am J Physiol. 1993 Apr;264(4 Pt 1):C1066-74. PMID: 8476012 [PubMed - indexed for MEDLINE]	anger in CHO
□370:	Furman I, Cook O, Kasir J, Rahamimoff H.	Related Articles, Links
	Cloning of two isoforms of the rat brain Na(+)-Ca2+ and their functional expression in HeLa cells. FEBS Lett. 1993 Mar 15;319(1-2):105-9. PMID: 8454039 [PubMed - indexed for MEDLINE]	exchanger gene
□371:	Wacholtz MC, Cragoe EJ Jr, Lipsky PE.	Related Articles, Links
	Delineation of the role of a Na+/Ca2+ exchanger in reintracellular Ca2+ in T cells. Cell Immunol. 1993 Mar;147(1):95-109. PMID: 8462115 [PubMed - indexed for MEDLINE]	egulating
□ 372:	Kimura M, Aviv A.	Related Articles, Links
	Regulation of the cytosolic pH set point for activation antiport in human platelets: the roles of the Na+/Ca2+ (+)-K(+)-2Cl- cotransport and cellular volume. Pflugers Arch. 1993 Mar;422(6):585-90. PMID: 8385772 [PubMed - indexed for MEDLINE]	
□373:	Waxman SG, Ritchie JM.	Related Articles, Links
	Molecular dissection of the myelinated axon. Ann Neurol. 1993 Feb;33(2):121-36. Review. PMID: 7679565 [PubMed - indexed for MEDLINE]	
□ 374:	Low W, Kasir J, Rahamimoff H.	Related Articles, Links
	Cloning of the rat heart Na(+)-Ca2+ exchanger and its expression in HeLa cells. FEBS Lett. 1993 Jan 18;316(1):63-7. PMID: 8422940 [PubMed - indexed for MEDLINE]	s functional
□ 375:	McDaniel LD, Lederer WJ, Kofuji P, Schulze DH, Kieval R, Schultz RA.	Related Articles, Links
	Mapping of the human cardiac Na+/Ca2+ exchanger a fluorescent in situ hybridization to chromosome region Cytogenet Cell Genet. 1993;63(3):192-3. PMID: 8485996 [PubMed - indexed for MEDLINE]	
□ 376:	Ransom BR, Waxman SG, Stys PK.	Related Articles, Links
	Anoxic injury of central myelinated axons: ionic mech pharmacology. Res Publ Assoc Res Nerv Ment Dis. 1993;71:121-51. Review. N PMID: 8417464 [PubMed - indexed for MEDLINE]	
□ 377:	Ponce-Hornos JE, Bonazzola P, Taquini AC.	Related Articles, Links
	[Energetics of ionic behavior in heart muscle contracts and physiopathologic aspects] Medicina (B Aires). 1993;53(5):445-58. Review. Spanish. PMID: 8201934 [PubMed - indexed for MEDLINE]	ion. Physiologic
	Decollogue S. Rertrand IR. Ascensio M. Drubaix I. Lelievre	

□ 378:	LG.	Related Articles, Links
	Na+, K(+)-ATPase and Na+/Ca2+ exchange isoforms physiopathological relevance. J Cardiovasc Pharmacol. 1993;22 Suppl 2:S96-8. Review. PMID: 7508043 [PubMed - indexed for MEDLINE]	s: physiological and
□ 379:	Kofuji P, Hadley RW, Kieval RS, Lederer WJ, Schulze DH.	Related Articles, Links
	Expression of the Na-Ca exchanger in diverse tissues cloned human cardiac Na-Ca exchanger. Am J Physiol. 1992 Dec;263(6 Pt 1):C1241-9. PMID: 1476165 [PubMed - indexed for MEDLINE]	a study using the
□ 380:	Valant PA, Adjei PN, Haynes DH.	Related Articles, Links
.	Rapid Ca2+ extrusion via the Na+/Ca2+ exchanger of platelet. J Membr Biol. 1992 Oct;130(1):63-82. PMID: 1469706 [PubMed - indexed for MEDLINE]	f the human
□ 381:	Wacholtz MC, Cragoe EJ Jr, Lipsky PE.	Related Articles, Links
	A Na(+)-dependent Ca2+ exchanger generates the sus intracellular Ca2+ required for T cell activation. J Immunol. 1992 Sep 15;149(6):1912-20. PMID: 1387665 [PubMed - indexed for MEDLINE]	stained increase in
□ 382:	Varro A, Papp JG.	Related Articles, Links
	The impact of single cell voltage clamp on the understandiac ventricular action potential. Cardioscience. 1992 Sep;3(3):131-44. Review. PMID: 1384746 [PubMed - indexed for MEDLINE]	tanding of the
□ 383:	Philipson KD, Nicoll DA.	Related Articles, Links
	Sodium-calcium exchange. Curr Opin Cell Biol. 1992 Aug;4(4):678-83. Review. PMID: 1419049 [PubMed - indexed for MEDLINE]	
□ 384:	Kiang JG, Koenig ML, Smallridge RC.	Related Articles, Links
	Heat shock increases cytosolic free Ca2+ concentration exchange in human epidermoid A 431 cells. Am J Physiol. 1992 Jul;263(1 Pt 1):C30-8. PMID: 1636682 [PubMed - indexed for MEDLINE]	on via Na(+)-Ca2+
□ 385:	Komuro I, Wenninger KE, Philipson KD, Izumo S.	Related Articles, Links
	Molecular cloning and characterization of the human exchanger cDNA. Proc Natl Acad Sci U S A. 1992 May 15;89(10):4769-73. PMID: 1374913 [PubMed - indexed for MEDLINE]	cardiac Na+/Ca2+
□ 386:	Smith TF, Sanchez-Legrand F, McKean LP, Kutner MH, Cragoe EJ Jr, Eaton DC.	Related Articles, Links
	Role of sodium in mediator release from human bason J Allergy Clin Immunol. 1992 May;89(5):978-86. PMID: 1374773 [PubMed - indexed for MEDLINE]	phils.
□ 387:	Shieh BH, Xia Y, Sparkes RS, Klisak I, Lusis AJ, Nicoll DA,	Related Articles, Links

	Philipson KD.	
	Mapping of the gene for the cardiac sarcolemmal Na(to human chromosome 2p21-p23. Genomics. 1992 Mar;12(3):616-7. PMID: 1559714 [PubMed - indexed for MEDLINE]	+)-Ca2+ exchanger
□ 388:	Kim-Lee MH, Stokes BT, Yates AJ.	Related Articles, Links
	Reperfusion paradox: a novel mode of glial cell injury Glia. 1992;5(1):56-64. PMID: 1531810 [PubMed - indexed for MEDLINE]	7.
□ 389:	Blaustein MP, Ambesi A, Bloch RJ, Goldman WF, Juhaszova M, Lindenmayer GE, Weiss DN.	Related Articles, Links
	Regulation of vascular smooth muscle contractility: resarcoplasmic reticulum (SR) and the sodium/calcium Jpn J Pharmacol. 1992;58 Suppl 2:107P-114P. Review. No abstr PMID: 1507528 [PubMed - indexed for MEDLINE]	exchanger.
□ 390:	Michaelis EK, Michaelis ML.	Related Articles, Links
	Molecular aspects of glutamate receptors and sodium-carriers in mammalian brain: implications for neurona degeneration. Neurochem Res. 1992 Jan;17(1):29-34. Review. PMID: 1371600 [PubMed - indexed for MEDLINE]	_
□ 391:	Holubarsch C.	Related Articles, Links
	[Biochemical changes and disorders of electromechan	•
	I	ncai couping in
	chronic heart failure] Z Kardiol. 1992;81 Suppl 4:17-21. Review. German. PMID: 1290294 [PubMed - indexed for MEDLINE]	near coupling in
	chronic heart failure] Z Kardiol. 1992;81 Suppl 4:17-21. Review. German.	Related Articles, Links
	chronic heart failure] Z Kardiol. 1992;81 Suppl 4:17-21. Review. German. PMID: 1290294 [PubMed - indexed for MEDLINE]	Related Articles, Links
□ 392: □	chronic heart failure] Z Kardiol. 1992;81 Suppl 4:17-21. Review. German. PMID: 1290294 [PubMed - indexed for MEDLINE] Lafond J, Leclerc M, Brunette MG. Characterization of calcium transport by basal plasma human placental syncytiotrophoblast. J Cell Physiol. 1991 Jul;148(1):17-23.	Related Articles, Links
□ 392: □	chronic heart failure] Z Kardiol. 1992;81 Suppl 4:17-21. Review. German. PMID: 1290294 [PubMed - indexed for MEDLINE] Lafond J, Leclerc M, Brunette MG. Characterization of calcium transport by basal plasma human placental syncytiotrophoblast. J Cell Physiol. 1991 Jul;148(1):17-23. PMID: 1650372 [PubMed - indexed for MEDLINE] Colvin RA, Bennett JW, Colvin SL, Allen RA, Martinez J,	Related Articles, Links membranes from Related Articles, Links
□ 392: □ 393:	chronic heart failure] Z Kardiol. 1992;81 Suppl 4:17-21. Review. German. PMID: 1290294 [PubMed - indexed for MEDLINE] Lafond J, Leclerc M, Brunette MG. Characterization of calcium transport by basal plasma human placental syncytiotrophoblast. J Cell Physiol. 1991 Jul;148(1):17-23. PMID: 1650372 [PubMed - indexed for MEDLINE] Colvin RA, Bennett JW, Colvin SL, Allen RA, Martinez J, Miner GD. Na+/Ca2+ exchange activity is increased in Alzheimetissues. Brain Res. 1991 Mar 8;543(1):139-47.	Related Articles, Links membranes from Related Articles, Links er's disease brain
□ 392: □ 393:	chronic heart failure] Z Kardiol. 1992;81 Suppl 4:17-21. Review. German. PMID: 1290294 [PubMed - indexed for MEDLINE] Lafond J, Leclerc M, Brunette MG. Characterization of calcium transport by basal plasma human placental syncytiotrophoblast. J Cell Physiol. 1991 Jul;148(1):17-23. PMID: 1650372 [PubMed - indexed for MEDLINE] Colvin RA, Bennett JW, Colvin SL, Allen RA, Martinez J, Miner GD. Na+/Ca2+ exchange activity is increased in Alzheimetissues. Brain Res. 1991 Mar 8;543(1):139-47. PMID: 1647256 [PubMed - indexed for MEDLINE] Williams JM, Abramovich DR, Dacke CG, Mayhew TM, Page	Related Articles, Links membranes from Related Articles, Links er's disease brain
□ 392: □ 393: □ 394:	chronic heart failure] Z Kardiol. 1992;81 Suppl 4:17-21. Review. German. PMID: 1290294 [PubMed - indexed for MEDLINE] Lafond J, Leclerc M, Brunette MG. Characterization of calcium transport by basal plasma human placental syncytiotrophoblast. J Cell Physiol. 1991 Jul;148(1):17-23. PMID: 1650372 [PubMed - indexed for MEDLINE] Colvin RA, Bennett JW, Colvin SL, Allen RA, Martinez J, Miner GD. Na+/Ca2+ exchange activity is increased in Alzheimetissues. Brain Res. 1991 Mar 8;543(1):139-47. PMID: 1647256 [PubMed - indexed for MEDLINE] Williams JM, Abramovich DR, Dacke CG, Mayhew TM, Page KR. Inhibitor action on placental calcium transport. Calcif Tissue Int. 1991 Jan;48(1):7-12.	Related Articles, Links membranes from Related Articles, Links er's disease brain

□ 396	Khananshvili D.	Related Articles, Links
	Mechanism of partial reactions in the cardiac Na(+)-	Ca2+ exchange
4	system. Ann N Y Acad Sci. 1991;639:85-95. Review. No abstract availa PMID: 1785897 [PubMed - indexed for MEDLINE]	able.
□ 397	Hoenig M, Culberson LH, Wheeler CA, Ferguson DC.	Related Articles, Links
	Characterization of Na(+)-Ca2+ exchange in the beta Ann N Y Acad Sci. 1991;639:657-9. Review. No abstract availa PMID: 1785893 [PubMed - indexed for MEDLINE]	
□ 398	Herchuelz A, Plasman PO.	Related Articles, Links
	Sodium-calcium exchange in the pancreatic B cell. Ann N Y Acad Sci. 1991;639:642-56. Review. No abstract avai PMID: 1785892 [PubMed - indexed for MEDLINE]	lable.
□ 399	Haynes DH, Valant PA, Adjei PN.	Related Articles, Links
	Calcium extrusion by the sodium-calcium exchanger	of the human
4	platelet. Ann N Y Acad Sci. 1991;639:592-603. No abstract available. PMID: 1785888 [PubMed - indexed for MEDLINE]	
□ 400	Windhager EE, Frindt G, Milovanovic S.	Related Articles, Links
	The role of Na-Ca exchange in renal epithelia. An ov Ann N Y Acad Sci. 1991;639:577-91. Review. No abstract avail PMID: 1785887 [PubMed - indexed for MEDLINE]	
□ 401	Matlib MA.	Related Articles, Links
□ 401 <u></u>	Role of sarcolemmal membrane sodium-calcium exc smooth muscle tension. Ann N Y Acad Sci. 1991;639:531-42. Review. PMID: 1785880 [PubMed - indexed for MEDLINE]	
	Role of sarcolemmal membrane sodium-calcium exc smooth muscle tension. Ann N Y Acad Sci. 1991;639:531-42. Review.	
	Role of sarcolemmal membrane sodium-calcium exc smooth muscle tension. Ann N Y Acad Sci. 1991;639:531-42. Review. PMID: 1785880 [PubMed - indexed for MEDLINE]	hange in vascular Related Articles, Links
☐ 402 ☐	Role of sarcolemmal membrane sodium-calcium exc smooth muscle tension. Ann N Y Acad Sci. 1991;639:531-42. Review. PMID: 1785880 [PubMed - indexed for MEDLINE] Aaronson PI, Poston L, Woolfson RG, Smirnov SV. Evidence for Na-Ca exchange in human resistance ar Ann N Y Acad Sci. 1991;639:521-30. No abstract available.	hange in vascular Related Articles, Links
☐ 402 ☐	Role of sarcolemmal membrane sodium-calcium exc smooth muscle tension. Ann N Y Acad Sci. 1991;639:531-42. Review. PMID: 1785880 [PubMed - indexed for MEDLINE] Aaronson PI, Poston L, Woolfson RG, Smirnov SV. Evidence for Na-Ca exchange in human resistance ar Ann N Y Acad Sci. 1991;639:521-30. No abstract available. PMID: 1785879 [PubMed - indexed for MEDLINE]	Related Articles, Links teries. Related Articles, Links teries. Related Articles, Links hal epithelial cells.
☐ 402 ☐ 403 ☐ 103	Role of sarcolemmal membrane sodium-calcium exc smooth muscle tension. Ann N Y Acad Sci. 1991;639:531-42. Review. PMID: 1785880 [PubMed - indexed for MEDLINE] Aaronson Pl, Poston L, Woolfson RG, Smirnov SV. Evidence for Na-Ca exchange in human resistance ar Ann N Y Acad Sci. 1991;639:521-30. No abstract available. PMID: 1785879 [PubMed - indexed for MEDLINE] Smith JB, Lyu RM, Smith L. Sodium-calcium exchange in aortic myocytes and rer Dependence on metabolic energy and intracellular so Ann N Y Acad Sci. 1991;639:505-20. Review. No abstract available.	Related Articles, Links teries. Related Articles, Links teries. Related Articles, Links hal epithelial cells.
☐ 402 ☐ 403 ☐ 103	Role of sarcolemmal membrane sodium-calcium exc smooth muscle tension. Ann N Y Acad Sci. 1991;639:531-42. Review. PMID: 1785880 [PubMed - indexed for MEDLINE] Aaronson PI, Poston L, Woolfson RG, Smirnov SV. Evidence for Na-Ca exchange in human resistance ar Ann N Y Acad Sci. 1991;639:521-30. No abstract available. PMID: 1785879 [PubMed - indexed for MEDLINE] Smith JB, Lyu RM, Smith L. Sodium-calcium exchange in aortic myocytes and rer Dependence on metabolic energy and intracellular so Ann N Y Acad Sci. 1991;639:505-20. Review. No abstract available. PMID: 1785878 [PubMed - indexed for MEDLINE]	Related Articles, Links teries. Related Articles, Links nal epithelial cells. dium. lable. Related Articles, Links
☐ 402 ☐ 403 ☐ 404 ☐	Role of sarcolemmal membrane sodium-calcium exc smooth muscle tension. Ann N Y Acad Sci. 1991;639:531-42. Review. PMID: 1785880 [PubMed - indexed for MEDLINE] Aaronson PI, Poston L, Woolfson RG, Smirnov SV. Evidence for Na-Ca exchange in human resistance ar Ann N Y Acad Sci. 1991;639:521-30. No abstract available. PMID: 1785879 [PubMed - indexed for MEDLINE] Smith JB, Lyu RM, Smith L. Sodium-calcium exchange in aortic myocytes and reputed to the period of	Related Articles, Links teries. Related Articles, Links nal epithelial cells. dium. lable. Related Articles, Links

	Ann N Y Acad Sci. 1991;639:312-24. Review. No abstract avail PMID: 1785857 [PubMed - indexed for MEDLINE]	able.
□ 406:	Yau KW, Nakatani K, Tamura T.	Related Articles, Links
	Sodium-calcium exchange and phototransduction in r photoreceptors. Ann N Y Acad Sci. 1991;639:275-84. Review. No abstract avail PMID: 1785854 [PubMed - indexed for MEDLINE]	
□ 407:	DiPolo R, Beauge L.	Related Articles, Links
	Regulation of Na-Ca exchange. An overview. Ann N Y Acad Sci. 1991;639:100-11. Review. No abstract avail PMID: 1785834 [PubMed - indexed for MEDLINE]	able.
□ 408:	Dale WE, Simchowitz L.	Related Articles, Links
	The role of Na(+)-Ca2+ exchange in human neutroph Ann N Y Acad Sci. 1991;639:616-30. Review. No abstract avail PMID: 1664709 [PubMed - indexed for MEDLINE]	
□ 409:	Mene P, Pugliese F, Faraggiana T, Cinotti GA.	Related Articles, Links
	Identification and characteristics of a Na+/Ca2+ exch human mesangial cells. Kidney Int. 1990 Dec;38(6):1199-205. PMID: 2074662 [PubMed - indexed for MEDLINE]	anger in cultured
□ 410:	Hoel G, Michaelis ML, Freed WJ, Kleinman JE.	Related Articles, Links
	Characterization of Na(+)-Ca2+ exchange activity in vesicles from postmortem human brain. Neurochem Res. 1990 Sep;15(9):881-7. PMID: 1703282 [PubMed - indexed for MEDLINE]	plasma membrane
□ 411:	Strehler EE.	Related Articles, Links
	Plasma membrane Ca2+ pumps and Na+/Ca2+ excha Semin Cell Biol. 1990 Aug;1(4):283-95. Review. PMID: 2151738 [PubMed - indexed for MEDLINE]	ngers.
□ 412:	[No authors listed]	Related Articles, Links
	Na(+)-Ca2+ exchanger and cardiac contraction. Lancet. 1990 Jul 28;336(8709):219-20. No abstract available. PMID: 1973777 [PubMed - indexed for MEDLINE]	
□ 413:	Gruver CL, Katz AM, Messineo FC.	Related Articles, Links
	Canine cardiac sarcolemmal vesicles demonstrate rap Ca2+ exchange activity. Circ Res. 1990 May;66(5):1171-7. PMID: 2335019 [PubMed - indexed for MEDLINE]	id initial Na(+)-
□ 414:	Chapman R.	Related Articles, Links
	A rise in intracellular sodium would seem to predispocalcium paradox. J Mol Cell Cardiol. 1990 May;22(5):503-5. No abstract available PMID: 2167385 [PubMed - indexed for MEDLINE]	
□ 415:	Ruigrok TJ.	Related Articles, Links

	Is an increase of intracellular Na+ during Ca2+ deplet the occurrence of the calcium paradox? J Mol Cell Cardiol. 1990 May;22(5):499-501. No abstract availa PMID: 2167384 [PubMed - indexed for MEDLINE]	
□ 416:	Philipson KD.	Related Articles, Links
	The cardiac Na(+)-Ca2+ exchanger: dependence on menvironment. Cell Biol Int Rep. 1990 Apr;14(4):305-9. Review. No abstract av PMID: 2191788 [PubMed - indexed for MEDLINE]	
□ 417:	Heilmann C, Spamer C, Gerok W.	Related Articles, Links
	Aspects of hepatic calcium metabolism. Prog Liver Dis. 1990;9:261-79. Review. No abstract available. PMID: 2156295 [PubMed - indexed for MEDLINE]	
□ 418:	Smith JB, Zheng T, Smith L.	Related Articles, Links
	Relationship between cytosolic free Ca2+ and Na+-Ca aortic muscle cells. Am J Physiol. 1989 Jan;256(1 Pt 1):C147-54. PMID: 2912132 [PubMed - indexed for MEDLINE]	a2+ exchange in
□ 419:	Parker JC.	Related Articles, Links
	Sodium-calcium and sodium-proton exchangers in rec Methods Enzymol. 1989;173:292-300. No abstract available. PMID: 2550727 [PubMed - indexed for MEDLINE]	l blood cells.
□ 420:	Schnetkamp PP.	Related Articles, Links
	Na-Ca or Na-Ca-K exchange in rod photoreceptors. Prog Biophys Mol Biol. 1989;54(1):1-29. Review. No abstract a PMID: 2484986 [PubMed - indexed for MEDLINE]	vailable.
□ 421:	Rengasamy A, Feinberg H.	Related Articles, Links
	Sodium-calcium exchange in platelet plasma membra: Adv Exp Med Biol. 1988;232:105-8. No abstract available. PMID: 3213678 [PubMed - indexed for MEDLINE]	ne vesicles.
□ 422:	Hermsmeyer RK.	Related Articles, Links
	Vascular muscle membrane cation mechanisms and to resistance. Hypertension. 1987 Nov;10(5 Pt 2):I20-2. Review. PMID: 2445679 [PubMed - indexed for MEDLINE]	tal peripheral
□ 423:	Letarte M, Quackenbush EJ, Baumal R, Michalak M.	Related Articles, Links
	Correlations between the 44D7 antigenic complex and membrane Na+-Ca2+ exchanger. Biochem Cell Biol. 1986 Nov;64(11):1160-9. PMID: 3828108 [PubMed - indexed for MEDLINE]	the plasma
□ 424:	Michalak M, Quackenbush EJ, Letarte M.	Related Articles, Links
	Inhibition of Na+/Ca2+ exchanger activity in cardiac a muscle sarcolemmal vesicles by monoclonal antibody J Biol Chem. 1986 Jan 5;261(1):92-5. PMID: 2416754 [PubMed - indexed for MEDLINE]	and skeletal 44D7.

□ 425 :	<u>Carafoli E.</u>	Related Articles, Links
	The homeostasis of calcium in heart cells. J Mol Cell Cardiol. 1985 Mar;17(3):203-12. PMID: 2943901 [PubMed - indexed for MEDLINE]	
□ 426 :	Philipson KD.	Related Articles, Links
	Sodium-calcium exchange in plasma membrane vesic Annu Rev Physiol. 1985;47:561-71. Review. No abstract availab PMID: 3888080 [PubMed - indexed for MEDLINE]	
□ 427:	Garrick R, Ziyadeh FN, Jorkasky D, Goldfarb S.	Related Articles, Links
	Bartter's syndrome: a unifying hypothesis. Am J Nephrol. 1985;5(5):379-84. Review. PMID: 2998188 [PubMed - indexed for MEDLINE]	
□ 428:	Shamoo AE, Ambudkar IS.	Related Articles, Links
	Regulation of calcium transport in cardiac cells. Can J Physiol Pharmacol. 1984 Jan;62(1):9-22. Review. PMID: 6143603 [PubMed - indexed for MEDLINE]	
Display	Summary Show 500 Sort by Send	to 🔻

Write to the Help Desk

NCBI | NLM | NIH

Department of Health & Human Services

Privacy Statement | Freedom of Information Act | Disclaimer

Mar 29 2005 17:30:14

FILE 'HOME' ENTERED AT 16:40:11 ON 07 APR 2005

=> file BIOSCIENCE FILE 'ADISCTI' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Adis Data Information BV

FILE 'ADISINSIGHT' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Adis Data Information BV

FILE 'ADISNEWS' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Adis Data Information BV

FILE 'AGRICOLA' ENTERED AT 16:40:20 ON 07 APR 2005

FILE 'ANABSTR' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (c) 2005 THE ROYAL SOCIETY OF CHEMISTRY (RSC)

FILE 'ANTE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Cambridge Scientific Abstracts (CSA)

FILE 'AQUALINE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Cambridge Scientific Abstracts (CSA)

FILE 'AQUASCI' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT 2005 FAO (On behalf of the ASFA Advisory Board). All rights reserved.

FILE 'BIOBUSINESS' ENTERED AT 16:40:20 ON 07 APR 2005 Copyright (c) 1998 The Thomson Corporation.

FILE 'BIOCOMMERCE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 BioCommerce Data Ltd. Richmond Surrey, United Kingdom. All rights reserved

FILE 'BIOENG' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Cambridge Scientific Abstracts (CSA)

FILE 'BIOSIS' ENTERED AT 16:40:20 ON 07 APR 2005 Copyright (c) 2005 The Thomson Corporation

FILE 'BIOTECHABS' ACCESS NOT AUTHORIZED

FILE 'BIOTECHDS' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION

FILE 'BIOTECHNO' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Elsevier Science B.V., Amsterdam. All rights reserved.

FILE 'CABA' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 CAB INTERNATIONAL (CABI)

FILE 'CANCERLIT' ENTERED AT 16:40:20 ON 07 APR 2005

FILE 'CAPLUS' ENTERED AT 16:40:20 ON 07 APR 2005
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.
COPYRIGHT (C) 2005 AMERICAN CHEMICAL SOCIETY (ACS)

FILE 'CEABA-VTB' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (c) 2005 DECHEMA eV

FILE 'CEN' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2001 American Chemical Society (ACS)

FILE 'CIN' ENTERED AT 16:40:20 ON 07 APR 2005
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.
COPYRIGHT (C) 2005 American Chemical Society (ACS)

FILE 'CONFSCI' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Cambridge Scientific Abstracts (CSA)

FILE 'CROPB' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION

FILE 'CROPU' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION

FILE 'DDFB' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION

FILE 'DDFU' ACCESS NOT AUTHORIZED

FILE 'DGENE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION

FILE 'DISSABS' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 ProQuest Information and Learning Company; All Rights Reserved.

FILE 'DRUGB' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION

FILE 'DRUGMONOG2' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 IMSWORLD Publications Ltd

FILE 'DRUGU' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION

FILE 'EMBAL' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Elsevier Inc. All rights reserved.

FILE 'EMBASE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Elsevier Inc. All rights reserved.

FILE 'ESBIOBASE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Elsevier Science B.V., Amsterdam. All rights reserved.

FILE 'FEDRIP' ENTERED AT 16:40:20 ON 07 APR 2005

FILE 'FOMAD' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Leatherhead Food Research Association

FILE 'FOREGE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Leatherhead Food Research Association

FILE 'FROSTI' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Leatherhead Food Research Association

FILE 'FSTA' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 International Food Information Service

FILE 'GENBANK' ENTERED AT 16:40:20 ON 07 APR 2005

FILE 'HEALSAFE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Cambridge Scientific Abstracts (CSA)

FILE 'IFIPAT' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 IFI CLAIMS(R) Patent Services (IFI)

FILE 'IMSDRUGNEWS' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 IMSWORLD Publications Ltd

FILE 'IMSPRODUCT' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 IMSWORLD Publications Ltd

FILE 'IMSRESEARCH' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 IMSWORLD Publications Ltd

FILE 'JICST-EPLUS' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Japan Science and Technology Agency (JST)

FILE 'KOSMET' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 International Federation of the Societies of Cosmetics Chemists

FILE 'LIFESCI' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Cambridge Scientific Abstracts (CSA)

FILE 'MEDICONF' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (c) 2005 FAIRBASE Datenbank GmbH, Hannover, Germany

FILE 'MEDLINE' ENTERED AT 16:40:20 ON 07 APR 2005

FILE 'NIOSHTIC' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 U.S. Secretary of Commerce on Behalf of the U.S. Government

FILE 'NTIS' ENTERED AT 16:40:20 ON 07 APR 2005 Compiled and distributed by the NTIS, U.S. Department of Commerce. It contains copyrighted material. All rights reserved. (2005)

FILE 'NUTRACEUT' ENTERED AT 16:40:20 ON 07 APR 2005 Copyright 2005 (c) MARKETLETTER Publications Ltd. All rights reserved.

FILE 'OCEAN' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Cambridge Scientific Abstracts (CSA)

FILE 'PASCAL' ENTERED AT 16:40:20 ON 07 APR 2005
Any reproduction or dissemination in part or in full,
by means of any process and on any support whatsoever
is prohibited without the prior written agreement of INIST-CNRS.
COPYRIGHT (C) 2005 INIST-CNRS. All rights reserved.

FILE 'PCTGEN' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 WIPO

FILE 'PHAR' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 T&F Informa UK Ltd.

FILE 'PHARMAML' ENTERED AT 16:40:20 ON 07 APR 2005 Copyright 2005 (c) MARKETLETTER Publications Ltd. All rights reserved.

FILE 'PHIC' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 T&F Informa UK Ltd.

FILE 'PHIN' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 T&F Informa UK Ltd.

FILE 'PROMT' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Gale Group. All rights reserved.

FILE 'PROUSDDR' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Prous Science

FILE 'PS' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Thieme on STN

FILE 'RDISCLOSURE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Kenneth Mason Publications Ltd.

FILE 'SCISEARCH' ENTERED AT 16:40:20 ON 07 APR 2005 Copyright (c) 2005 The Thomson Corporation

FILE 'SYNTHLINE' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Prous Science

FILE 'TOXCENTER' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 ACS

FILE 'USPATFULL' ENTERED AT 16:40:20 ON 07 APR 2005
CA INDEXING COPYRIGHT (C) 2005 AMERICAN CHEMICAL SOCIETY (ACS)

FILE 'USPAT2' ENTERED AT 16:40:20 ON 07 APR 2005
CA INDEXING COPYRIGHT (C) 2005 AMERICAN CHEMICAL SOCIETY (ACS)

FILE 'VETB' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION FILE 'VETU' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION FILE 'WATER' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 Cambridge Scientific Abstracts (CSA) FILE 'WPIDS' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THE THOMSON CORPORATION FILE 'WPIFV' ENTERED AT 16:40:20 ON 07 APR 2005 COPYRIGHT (C) 2005 THOMSON DERWENT FILE 'WPINDEX' ACCESS NOT AUTHORIZED => s human sodium-calcium exchanger 14 FILES SEARCHED... 25 FILES SEARCHED... 35 FILES SEARCHED... 51 FILES SEARCHED... 62 FILES SEARCHED... 71 FILES SEARCHED... L129 HUMAN SODIUM-CALCIUM EXCHANGER => DUP REM L1 DUPLICATE IS NOT AVAILABLE IN 'ADISINSIGHT, ADISNEWS, BIOCOMMERCE, DGENE, DRUGMONOG2, FEDRIP, FOREGE, GENBANK, IMSPRODUCT, IMSRESEARCH, KOSMET, MEDICONF, NUTRACEUT, PCTGEN, PHAR, PHARMAML, PROUSDDR, PS, RDISCLOSURE, SYNTHLINE'. ANSWERS FROM THESE FILES WILL BE CONSIDERED UNIQUE PROCESSING COMPLETED FOR L1 26 DUP REM L1 (3 DUPLICATES REMOVED) => D L2 1-26 ANSWER 1 OF 26 CAPLUS COPYRIGHT 2005 ACS on STN L2AN 2004:120883 CAPLUS DN 140:176296 ΤI cDNA and protein sequences of human potassium-dependent sodium-calcium exchanger and its uses in therapeutics and drug screening IN Nozawa, Katsura; Mochizuki, Shinobu PA Yamanouchi Pharmaceutical Co., Ltd., Japan SO PCT Int. Appl., 56 pp. CODEN: PIXXD2 DT Patent LA Japanese FAN.CNT 1 PATENT NO. KIND DATE APPLICATION NO. DATE ------------------_____ ΡI WO 2004013173 A1 20040212 WO 2003-JP309732 20030731 W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG CA 2480427 $\mathbf{A}\mathbf{A}$ 20040212 CA 2003-2480427 20030731 PRAI JP 2002-225114 Α 20020801 JP 2003-182989 Α 20030626 WO 2003-JP9732 20030731 W

 L_2 ANSWER 2 OF 26 USPATFULL on STN AN

2004:69593 USPATFULL

ΤI Fusion proteins comprising DP-178 and other viral fusion inhibitor peptides useful for treating aids

```
IN
       Bolognesi, Dani Paul, Durham, NC, UNITED STATES
       Matthews, Thomas James, Durham, NC, UNITED STATES
       Wild, Carl T., Durham, NC, UNITED STATES
       Barney, Shawn O?apos, Lin, Cary, NC, UNITED STATES
       Lambert, Dennis Michael, Cary, NC, UNITED STATES
       Petteway, Stephen Robert, Cary, NC, UNITED STATES
       Langlois, Alphonse J., Durham, NC, UNITED STATES
       Duke University (U.S. corporation)
PA
       Trimeris, Inc. (U.S. corporation)
       US 2004052820
PΙ
                          A1
                               20040318
       US 2002-267748
AΙ
                          Α1
                               20021008 (10)
RLI
       Continuation of Ser. No. US 1995-484223, filed on 7 Jun 1995, PENDING
       Division of Ser. No. US 1995-470896, filed on 6 Jun 1995, GRANTED, Pat.
       No. US 6479055 Continuation-in-part of Ser. No. US 1994-360107, filed on
       20 Dec 1994, GRANTED, Pat. No. US 6017536 Continuation-in-part of Ser.
       No. US 1994-255208, filed on 7 Jun 1994, GRANTED, Pat. No. US 6440656
       Continuation-in-part of Ser. No. US 1993-73028, filed on 7 Jun 1993,
       GRANTED, Pat. No. US 5464933
DT
       Utility
FS
       APPLICATION
LN.CNT 40442
INCL
       INCLM: 424/208.100
       INCLS: 424/188.100; 530/350.000; 424/204.100; 530/300.000
NCL
       NCLM: 424/208.100
       NCLS: 424/188.100; 530/350.000; 424/204.100; 530/300.000
IC
       [7]
       ICM: A61K039-21
       ICS: C07K014-16; A61K039-12; C07K002-00; C07K004-00; C07K005-00;
       C07K007-00; C07K014-00; C07K016-00; C07K017-00; A61K038-00; C07K001-00
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
     ANSWER 3 OF 26 USPATFULL on STN
L_2
AN
       2004:44245 USPATFULL
TI
       Nucleic acids encoding DP-178 and other viral fusion inhibitor peptides
       useful for treating aids
IN
       Bolognesi, Dani Paul, Durham, NC, UNITED STATES
       Matthews, Thomas James, Durham, NC, UNITED STATES
       Wild, Carl T., Durham, NC, UNITED STATES
PA
       Duke University (U.S. corporation)
PΙ
       US 2004033235
                          A1
                               20040219
ΑI
       US 2003-267682
                               20030106 (10)
                          A1
       Continuation of Ser. No. US 1995-484223, filed on 7 Jun 1995, PENDING
RLI
       Division of Ser. No. US 1995-470896, filed on 6 Jun 1995, GRANTED, Pat.
       No. US 6479055 Continuation-in-part of Ser. No. US 1994-360107, filed on
       20 Dec 1994, GRANTED, Pat. No. US 6017536 Continuation-in-part of Ser.
       No. US 1994-255208, filed on 7 Jun 1994, GRANTED, Pat. No. US 6440656
       Continuation-in-part of Ser. No. US 1993-73028, filed on 7 Jun 1993,
       GRANTED, Pat. No. US 5464933
DT
       Utility
       APPLICATION
FS
LN.CNT 59510
INCL
       INCLM: 424/186.100
       INCLS: 424/188.100; 530/350.000; 424/208.100; 424/187.100
NCL
       NCLM: 424/186.100
       NCLS: 424/188.100; 530/350.000; 424/208.100; 424/187.100
IC
       [7]
       ICM: A61K039-21
       ICS: A61K039-12; C07K014-16; C07K014-10; C07K014-05; C07K014-11
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
L2
     ANSWER 4 OF 26 USPATFULL on STN
ΆN
       2004:301902 USPATFULL
       Methods for inhibition of membrane fusion-associated events, including
ΤI
       HIV transmission
IN
       Bolognesi, Dani Paul, Durham, NC, United States
       Matthews, Thomas James, Durham, NC, United States
       Wild, Carl T., Durham, NC, United States
PΑ
       Duke University, Durham, NC, United States (U.S. corporation)
PΙ
       US 6824783
                               20041130
                          В1
ΑI
       US 1995-487266
                               19950607 (8)
RLI
       Division of Ser. No. US 1995-470896, filed on 6 Jun 1995, now patented,
       Pat. No. US 6479055 Continuation-in-part of Ser. No. US 1994-360107,
```

```
filed on 20 Dec 1994, now patented, Pat. No. US 6017536
       Continuation-in-part of Ser. No. US 1994-255208, filed on 7 Jun 1994,
       now patented, Pat. No. US 5440656 Continuation-in-part of Ser. No. US
       1993-73028, filed on 7 Jun 1993, now patented, Pat. No. US 5464933
DT
       Utility
FS
       GRANTED
LN.CNT 25013
INCL
       INCLM: 424/188.100
       INCLS: 424/208.100; 435/005.000; 530/360.000
NCL
       NCLM: 424/188.100
       NCLS: 424/208.100; 435/005.000; 530/360.000
IC
       [7]
       ICM: A61K039-21
EXF
       435/5; 530/300; 530/350
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
L2
     ANSWER 5 OF 26 BIOSIS COPYRIGHT (c) 2005 The Thomson Corporation on STN
ΑN
     2005:48406 BIOSIS
DN
     PREV200500049773
ΤI
     Down-regulation of sarcolipin mRNA expression in chronic atrial
     fibrillation.
     Uemura, N.; Ohkusa, T.; Hamano, K.; Nakagome, M.; Hori, H.; Shimizu, M.;
AU
     Matsuzaki, M.; Mochizuki, S.; Minamisawa, S. [Reprint Author]; Ishikawa,
CS
     Grad Sch MedDept PhysiolKanazawa Ku, Yokohama City Univ, 3-9 Fukuura,
     Yokohama, Kanagawa, 2360004, Japan
     sminamis@med.yokohama-cu.ac.jp
     European Journal of Clinical Investigation, (November 2004) Vol. 34, No.
     11, pp. 723-730. print.
     CODEN: EJCIB8. ISSN: 0014-2972.
DT
     Article
LA
     English
ED
     Entered STN: 26 Jan 2005
     Last Updated on STN: 26 Jan 2005
     ANSWER 6 OF 26 USPATFULL on STN
L2
AN
       2003:312209 USPATFULL
       Novel 18607, 15603, 69318, 12303, 48000, 52920, 5433, 38554, 57301,
TI
       58324, 55063, 52991, 59914, 59921 and 33751 molecules and uses therefor
IN
       Glucksmann, Maria A., Lexington, MA, UNITED STATES
       Curtis, Rory A.J., Ashland, MA, UNITED STATES
       Lora, Jose M., Arlington, MA, UNITED STATES
       Galvin, Katherine M., Jamaica Plain, MA, UNITED STATES
       Silos-Santiago, Inmaculada, Del Mar, CA, UNITED STATES
PA
       Millennium Pharmaceuticals, Inc. (U.S. corporation)
PΙ
       US 2003219806
                          A1
                               20031127
ΑI
       US 2003-391399
                          Α1
                               20030318 (10)
RLI
       Continuation-in-part of Ser. No. US 2001-789481, filed on 20 Feb 2001,
       PENDING Continuation-in-part of Ser. No. US 2000-634669, filed on 8 Aug
       2000, ABANDONED Continuation-in-part of Ser. No. US 2000-583373, filed
       on 31 May 2000, ABANDONED Continuation-in-part of Ser. No. US
       2000-510706, filed on 22 Feb 2000, ABANDONED Continuation-in-part of
       Ser. No. US 2002-309804, filed on 4 Dec 2002, PENDING
       Continuation-in-part of Ser. No. US 2002-94214, filed on 8 Mar 2002,
       PENDING Continuation-in-part of Ser. No. US 2001-828035, filed on 6 Apr
       2001, ABANDONED Continuation-in-part of Ser. No. US 2001-891762, filed
       on 26 Jun 2001, PENDING Continuation-in-part of Ser. No. US 2002-245121,
       filed on 17 Sep 2002, PENDING Continuation-in-part of Ser. No. US
       2002-95139, filed on 11 Mar 2002, PENDING Continuation-in-part of Ser.
       No. US 2001-957683, filed on 19 Sep 2001, ABANDONED Continuation-in-part
       of Ser. No. US 2001-942447, filed on 29 Aug 2001, ABANDONED
       Continuation-in-part of Ser. No. US 2002-62937, filed on 31 Jan 2002,
       PENDING Continuation-in-part of Ser. No. US 2002-255532, filed on 26 Sep
       2002, PENDING
                           20011204 (60)
PRAI
       US 2001-336936P
                           20010312 (60)
       US 2001-275078P
       US 2000-195734P
                           20000407 (60)
                           20000626 (60)
       US 2000-214176P
                           20010917 (60)
       US 2001-322983P
       US 2001-275172P
                           20010312 (60)
       US 2000-233537P
                           20000919 (60)
       US 2000-229036P
                           20000831 (60)
```

```
US 2001-267076P
                           20010201 (60)
       US 2001-325854P
                           20010927 (60)
       Utility
DT
FS
       APPLICATION
LN.CNT 19893
INCL
       INCLM: 435/006.000
       INCLS: 435/069.100; 435/183.000; 435/320.100; 435/325.000; 514/012.000;
              530/388.100; 530/350.000; 536/023.200
NCL
       NCLM:
              435/006.000
       NCLS:
              435/069.100; 435/183.000; 435/320.100; 435/325.000; 514/012.000;
              530/388.100; 530/350.000; 536/023.200
IC
       [7]
       ICM: C12Q001-68
       ICS: C07H021-04; A61K038-17; C07K014-47; C12P021-02; C12N005-06
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
     ANSWER 7 OF 26 USPATFULL on STN
L2
AN
       2003:113015 USPATFULL
TI
       96829, a human transporter family member and uses therefor
IN
       Curtis, Rory A.J., Framingham, MA, UNITED STATES
PA
       Millennium Pharmaceuticals, Inc. (U.S. corporation)
PΙ
       US 2003077748
                          A1
                               20030424
                               20021003 (10)
ΑI
       US 2002-264104
                          Α1
PRAI
       US 2001-326906P
                           20011003 (60)
       Utility
DT
FS
       APPLICATION
LN.CNT 4769
       INCLM: 435/069.100
INCL
       INCLS: 435/320.100; 435/325.000; 530/350.000; 536/023.500
NCL
       NCLM: 435/069.100
       NCLS: 435/320.100; 435/325.000; 530/350.000; 536/023.500
IC
       [7]
       ICM: C12P021-02
       ICS: C12N005-06; C07K014-47; C07H021-04
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
     ANSWER 8 OF 26 USPATFULL on STN
1.2
AN
       2003:78428 USPATFULL
       Methods of identifying the activity of gene products
TI
       Blume, Arthur J., Annandale, NJ, UNITED STATES
IN
       Goldstein, Neil, Maplewood, NJ, UNITED STATES
       Pillutla, Renuka, Bridgewater, NJ, UNITED STATES
       Hsiao, Ku-Chuan, Easton, PA, UNITED STATES
       Prendergast, John, Lawrenceville, NJ, UNITED STATES
PT
       US 2003054348
                          A1
                               20030320
       US 2001-852455
ΑI
                               20010509 (9)
                          Α1
       US 2000-202912P
                           20000509 (60)
PRAI
DT
       Utility
       APPLICATION
FS
LN.CNT 1435
INCL
       INCLM: 435/006.000
       INCLS: 435/007.100; 435/007.210
NCL
       NCLM: 435/006.000
       NCLS: 435/007.100; 435/007.210
IC
       [7]
       ICM: C12Q001-68
       ICS: G01N033-53; G01N033-567
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
     ANSWER 9 OF 26 USPATFULL on STN
1.2
       2003:40533 USPATFULL
AN
TΤ
       Methods for the inhibition of epstein-barr virus transmission employing
       anti-viral peptides capable of abrogating viral fusion and transmission
TN
       Barney, Shawn O'Lin, Cary, NC, United States
       Lambert, Dennis Michael, Cary, NC, United States
       Petteway, Stephen Robert, Cary, NC, United States
PΑ
       Trimeris, Inc., Durham, NC, United States (U.S. corporation)
PΤ
       US 6518013
                          В1
                                20030211
AΤ
       US 1995-485546
                                19950607 (8)
RLT
       Continuation-in-part of Ser. No. US 1994-360107, filed on 20 Dec 1994,
       now patented, Pat. No. US 6017536 Continuation-in-part of Ser. No. US
       1994-255208, filed on 7 Jun 1994 Continuation-in-part of Ser. No. US
```

```
1993-73028, filed on 7 Jun 1993, now patented, Pat. No. US 5464933
DТ
       Utility
FS
       GRANTED
LN.CNT 24700
INCL
       INCLM: 435/005.000
       INCLS: 424/230.100; 530/300.000; 530/324.000; 530/325.000; 530/326.000
NCL
       NCLM: 435/005.000
       NCLS: 424/230.100; 530/300.000; 530/324.000; 530/325.000; 530/326.000
       [7]
IC
       ICM: C12Q001-70
       435/5; 530/300; 530/324-329; 530/350; 424/230.1
EXF
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
L2
     ANSWER 10 OF 26 CAPLUS COPYRIGHT 2005 ACS on STN
AN
     2003:308886 CAPLUS
DN
     139:301072
TI
     Clinical potential of sodium-calcium exchanger inhibitors as
     antiarrhythmic agents
AU
     Pogwizd, Steven M.
     Department of Medicine, University of Illinois at Chicago, Chicago, IL,
CS
SO
     Drugs (2003), 63(5), 439-452
     CODEN: DRUGAY; ISSN: 0012-6667
PB
     Adis International Ltd.
DT
     Journal; General Review
LA
     English
RE.CNT 110
              THERE ARE 110 CITED REFERENCES AVAILABLE FOR THIS RECORD
              ALL CITATIONS AVAILABLE IN THE RE FORMAT
L_2
     ANSWER 11 OF 26 CAPLUS COPYRIGHT 2005 ACS on STN DUPLICATE 1
AN
     2003:450973 CAPLUS
DN
     139:2086
ΤI
     Protein and cDNA sequences of 8.8-kilodalton
                                                    ***human***
       ***sodium*** - ***calcium*** ***exchanger*** -like protein and
     their therapeutic uses
IN
     Mao, Yumin; Xie, Yi
     Bode Gene Development Co., Ltd., Shanghai, Peop. Rep. China
PΑ
SO
     Faming Zhuanli Shenqing Gongkai Shuomingshu, 33 pp.
     CODEN: CNXXEV
DT
     Patent
LΑ
     Chinese
FAN.CNT 1
     PATENT NO.
                        KTND
                               DATE
                                           APPLICATION NO.
                                                                   DATE
                        ----
                               -----
                                           -----
                                                                   _____
PΤ
     CN 1361154
                         Α
                                            CN 2000-135949
                                20020731
                                                                   20001226
PRAI CN 2000-135949
                                20001226
     ANSWER 12 OF 26 IFIPAT COPYRIGHT 2005 IFI on STN DUPLICATE 2
L2
AN
      10188601 IFIPAT; IFIUDB; IFICDB
      69318, A ***HUMAN***
ΤI
                                ***SODIUM*** / ***CALCIUM***
                         (TRANSPORTER) FAMILY MEMBER AND USES THEREFOR;
        ***EXCHANGER***
      NUCLEOTIDE SEQUENCES CODING TRANSPORT PROTEIN FOR USE IN THE TREATMENT OF
      NERVOUS SYSTEM, CARDIOVASCULAR, CELLULAR PROLIFERATIVE AND/OR
      DIFFERENTIATIVE, IMMUNE, INFLAMMATORY, HEMATOPOIETIC, PAIN OR METABOLIC
      DISORDERS
IN
      Curtis Rory A J
PA
      Millennium Pharmaceuticals Inc (41994)
PΤ
      US 2002132303 A1 20020919
      US 2002-94214
AΙ
                          20020308
PRAI
     US 2001-275078P
                          20010312 (Provisional)
FI
      US 2002132303
                         20020919
DT
      Utility; Patent Application - First Publication
FS
      CHEMICAL
      APPLICATION
CLMN
      22
GΙ
       1 Figure(s).
     FIG. 1 depicts a hydropathy plot of human 69318. Relatively hydrophobic
      residues are shown above the dashed horizontal line, and relatively
      hydrophilic residues are below the dashed horizontal line. The cysteine
      residues (cys) are indicated by short vertical lines just below the
      hydropathy trace. The numbers corresponding to the amino acid sequence of
      human 69318 are indicated. Polypeptides of the invention include
```

fragments which include: all or part of a hydrophobic sequence, e.g., a sequence above the dashed line, e.g., the sequence from about amino acid 10 to 26, from about 168 to 192, and from about 486 to 509 of SEQ ID NO:2; all or part of a hydrophilic sequence, e.g., a sequence below the dashed line, e.g., the sequence from about amino acid 251 to 258, from about 271 to 281, and from about 346 to 357 of SEQ ID NO:2; a sequence which includes a Cys, or a glycosylation site.

```
L2
     ANSWER 13 OF 26 CAPLUS COPYRIGHT 2005 ACS on STN
ΑN
     2002:864380 CAPLUS
DN
     137:346217
TI
     Targeting the reverse mode of the sodium/calcium exchanger for the
     treatment of optic neuropathy associated with glaucoma and ischemic optic
IN
     Adorante, Joseph S.; Ehring, George R.; Kopper, Kara L.
PA
     Allergan, Inc., USA
     U.S., 6 pp.
SO
     CODEN: USXXAM
DT
     Patent
LΑ
     English
FAN.CNT 1
     PATENT NO.
                         KIND
                                DATE
                                            APPLICATION NO.
                                                                    DATE
                         _ _ _ _
                                _____
PΤ
     US 6479458
                          B1
                                            US 2001-5829
                                20021112
                                                                    20011108
     WO 2003039573
                         A1
                                20030515
                                            WO 2002-US32651
                                                                    20021011
         W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
             GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
             LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,
             PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ,
             UA, UG, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ,
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG,
             CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL,
             PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR,
             NE, SN, TD, TG
     EP 1441751
                          A1
                                20040804
                                            EP 2002-778535
                                                                    20021011
             AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
             IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, SK
     BR 2002013947
                          Α
                                20040831
                                            BR 2002-13947
                                                                    20021011
     JP 2005508374
                          T2
                                20050331
                                            JP 2003-541864
                                                                    20021011
PRAI US 2001-5829
                          Α
                                20011108
     WO 2002-US32651
                          W
                                20021011
RE.CNT 18
              THERE ARE 18 CITED REFERENCES AVAILABLE FOR THIS RECORD
              ALL CITATIONS AVAILABLE IN THE RE FORMAT
L2
     ANSWER 14 OF 26 USPATFULL on STN
AN
       2002:297296 USPATFULL
TI
       Methods for inhibition of membrane fusion-associated events, including
       respiratory syncytial virus transmission
IN
       Bolognesi, Dani Paul, Durham, NC, United States
       Matthews, Thomas James, Durham, NC, United States
       Wild, Carl T., Durham, NC, United States
       Barney, Shawn O'Lin, Cary, NC, United States
       Lambert, Dennis Michael, Cary, NC, United States
       Petteway, Stephen Robert, Cary, NC, United States
       Langlois, Alphonse J., Durham, NC, United States
PA
       Trimeris, Inc., Durham, NC, United States (U.S. corporation)
PΙ
       US 6479055
                          В1
                               20021112
ΑI
       US 1995-470896
                               19950606 (8)
RLI
       Continuation-in-part of Ser. No. US 1994-360107, filed on 20 Dec 1994,
       now patented, Pat. No. US 6017536 Continuation-in-part of Ser. No. US
       1994-255208, filed on 7 Jun 1994 Continuation-in-part of Ser. No. US
       1993-73028, filed on 7 Jun 1993, now patented, Pat. No. US 5464933
DT
       Utility
FS
       GRANTED
LN.CNT 26553
       INCLM: 424/211.100
INCL
       INCLS: 424/186.100; 530/324.000
NCL
              424/211.100
       NCLM:
       NCLS: 424/186.100; 530/324.000
IC
       [7]
```

ICM: A61K039-145

```
EXF
       435/5; 435/240.2; 424/184.1-189.1; 424/204.1-211.1; 424/225.1;
       424/227.1; 424/230.1; 514/1; 514/2; 530/324; 530/350; 530/826
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
L2
     ANSWER 15 OF 26 USPATFULL on STN
MΔ
       2001:67794 USPATFULL
       Human respiratory syncytial virus peptides with antifusogenic and
TT
       antiviral activities
       Barney, Shawn O'Lin, Cary, NC, United States
IN
       Lambert, Dennis Michael, Cary, NC, United States
       Petteway, Stephen Robert, Cary, NC, United States
       Trimeris, Inc., Durham, NC, United States (U.S. corporation)
PA
ΡI
       US 6228983
                          В1
                               20010508
       US 1995-485264
AΙ
                               19950607 (8)
RLI
       Division of Ser. No. US 1995-470896, filed on 6 Jun 1995
       Continuation-in-part of Ser. No. US 1994-360107, filed on 20 Dec 1994
       Continuation-in-part of Ser. No. US 1994-255208, filed on 7 Jun 1994
       Continuation-in-part of Ser. No. US 1993-73028, filed on 7 Jun 1993, now
       patented, Pat. No. US 5464933
DT
       Utility
FS
       Granted
LN.CNT 32166
INCL
       INCLM: 530/300.000
       INCLS: 530/324.000; 530/325.000; 530/326.000; 424/211.100; 424/186.100
       NCLM: 530/300.000
NCL
       NCLS: 424/186.100; 424/211.100; 530/324.000; 530/325.000; 530/326.000
IC
       [7]
       ICM: A61K038-00
EXF
       530/350; 530/324-329; 530/300; 424/211.1
CAS INDEXING IS AVAILABLE FOR THIS PATENT.
L2
     ANSWER 16 OF 26 BIOSIS COPYRIGHT (c) 2005 The Thomson Corporation on
AN
     2001:558807 BIOSIS
DN
     PREV200100558807
TT
     Genome search for QTL controlling pulse pressure: A practical application
     of the unified Haseman-Elston algorithm.
     Li, J. [Reprint author]; Niu, T. [Reprint author]; Rogus, J.; Yang, J.;
     Schork, N. [Reprint author]; Fang, Z.; Xu, X. [Reprint author]
     Prog Population Genetics, Harvard Sch Public Health, Boston, MA, USA
CS
SO
     American Journal of Human Genetics, (October, 2001) Vol. 69, No. 4
     Supplement, pp. 510. print.
     Meeting Info.: 51st Annual Meeting of the American Society of Human
     Genetics. San Diego, California, USA. October 12-16, 2001.
     CODEN: AJHGAG. ISSN: 0002-9297.
     Conference; (Meeting)
     Conference; Abstract; (Meeting Abstract)
     Conference; (Meeting Poster)
     English
LA
     Entered STN: 5 Dec 2001
     Last Updated on STN: 25 Feb 2002
     ANSWER 17 OF 26 BIOSIS COPYRIGHT (c) 2005 The Thomson Corporation on
L2
AN
     1999:194919 BIOSIS
DN
     PREV199900194919
TT
     Gene expression of Na/Ca exchanger during development in human fetal
     Qu, Y. [Reprint author]; Ghatpande, A. [Reprint author]; El-Sherif, N.
     [Reprint author]; Boutjdir, M. [Reprint author]
     V.A. Medical and SUNY/HS Centers, Brooklyn, NY, 11209, USA
CS
     Biophysical Journal, (Jan., 1999) Vol. 76, No. 1 PART 2, pp. A300. print.
     Meeting Info.: Forty-third Annual Meeting of the Biophysical Society.
     Baltimore, Maryland, USA. February 13-17, 1999.
     CODEN: BIOJAU. ISSN: 0006-3495.
DT
     Conference; (Meeting)
     Conference; Abstract; (Meeting Abstract)
     Conference; (Meeting Poster)
LA
     English
ED
     Entered STN: 25 May 1999
     Last Updated on STN: 25 May 1999
```

```
L_2
     ANSWER 18 OF 26 CAPLUS COPYRIGHT 2005 ACS on STN
ΆN
     1997:24471 CAPLUS
DN
     126:128406
TI
     Molecular characterization of the human airway smooth muscle Na+/Ca2+
     exchanger
     Pitt, Anthony; Knox, Alan J.
ΑIJ
CS
     Department of Respiratory Medicine, City Hospital, Nottingham, UK
     American Journal of Respiratory Cell and Molecular Biology (1996), 15(6),
SO
     726-730
     CODEN: AJRBEL; ISSN: 1044-1549
PB
     American Lung Association
DT
     Journal
LA
     English
RE.CNT 33
              THERE ARE 33 CITED REFERENCES AVAILABLE FOR THIS RECORD
              ALL CITATIONS AVAILABLE IN THE RE FORMAT
L2
     ANSWER 19 OF 26 CAPLUS COPYRIGHT 2005 ACS on STN
ΑN
     1996:432802 CAPLUS
DN
     125:134211
     Molecular biological studies of the cardiac sodium-calcium exchanger
TТ
ΑU
     Kraev, Alexander; Chumakov, Ilya; Carafoli, Ernesto
     Laboratory of Biochemistry III, Swiss Federal Institute of Technology
CS
     (ETH), Zurich, CH-8092, Switz.
     Annals of the New York Academy of Sciences (1996), 779 (Sodium-Calcium
SO
     Exchange), 103-109
     CODEN: ANYAA9; ISSN: 0077-8923
PΒ
     New York Academy of Sciences
DT
     Journal
LA
     English
     ANSWER 20 OF 26 BIOSIS COPYRIGHT (c) 2005 The Thomson Corporation on
L2
                                                         DUPLICATE 3
AN
     1990:519135 BIOSIS
DN
     PREV199090136411; BA90:136411
TТ
     A TETRODOTOXIN AND MANGANESE INSENSITIVE SODIUM CURRENT IN DUCHENNE
     MUSCULAR DYSTROPHY.
AU
     BKAILY G [Reprint author]; JASMIN G; TAUTU C; PROCHEK L; YAMAMOTO T;
     SCULPTOREANU A; PEYROW M; JACQUES D
CS
     DEP PHYSIOLOGY BIOPHYSICS, FAC MED, UNIVERSITY SHERBROOKE, SHERBROOKE,
     QUEBEC, CANADA J1H 5N4
     Muscle and Nerve, (1990) Vol. 13, No. 10, pp. 939-948.
SO
     CODEN: MUNEDE. ISSN: 0148-639X.
DТ
     Article
FS
     BA
     ENGLISH
LA
ED
     Entered STN: 19 Nov 1990
     Last Updated on STN: 20 Nov 1990
      ANSWER 21 OF 26 DGENE COPYRIGHT 2005 The Thomson Corp on STN
L2
      ABB84483 Protein
AN
                              DGENE
TT
      New nucleic acid molecules designated 69318 encoding sodium/calcium
      exchanger family members, useful in screening assays, diagnostic assays,
      and treating conditions related to aberrant activity
TN
      Curtis R A J
PΑ
                 MILLENIUM PHARM INC.
      (MILL-N)
PΤ
      EP 1241260 A1 20020918
                                                61p
ΑI
     EP 2002-251810
                           20020312
PRAI
     US 2001-275078
                           20010312
DT
     Patent
LA
     English
OS
      2002-714944 [78]
CR
     N-PSDB: AAF88811; AAF88812
                        ***sodium*** / ***calcium***
DESC
        ***Human***
                                                            ***exchanger***
      69318.
     ANSWER 22 OF 26 DGENE COPYRIGHT 2005 The Thomson Corp on STN
L2
AN
      AAF88812 DNA
                          DGENE
TI
      New nucleic acid molecules designated 69318 encoding sodium/calcium
      exchanger family members, useful in screening assays, diagnostic assays,
      and treating conditions related to aberrant activity
TN
      Curtis R A J
PΑ
      (MILL-N)
                  MILLENIUM PHARM INC.
```

```
61p
АΤ
     EP 2002-251810
                          20020312
PRAI US 2001-275078
                          20010312
DT
     Patent
T.A
     English
OS
     2002-714944 [78]
CR
     P-PSDB: ABB84483
DESC
       ***Human***
                       ***sodium*** / ***calcium***
                                                         ***exchanger***
     69318 coding region DNA.
     ANSWER 23 OF 26 DGENE COPYRIGHT 2005 The Thomson Corp on STN
L2
AN
     AAF88811 DNA
                         DGENE
     New nucleic acid molecules designated 69318 encoding sodium/calcium
TΙ
     exchanger family members, useful in screening assays, diagnostic assays,
     and treating conditions related to aberrant activity -
IN
     Curtis R A J
PA
      (MILL-N)
                 MILLENIUM PHARM INC.
ΡI
     EP 1241260 A1 20020918
                                              61p
     EP 2002-251810
AΙ
                         20020312
PRAI US 2001-275078
                          20010312
DT
     Patent
LA
     English
OS
     2002-714944 [78]
CR
     P-PSDB: ABB84483
DESC
                       ***sodium*** / ***calcium***
       ***Human***
                                                         ***exchanger***
     69318 DNA.
L2
    ANSWER 24 OF 26
                         GENBANK.RTM. COPYRIGHT 2005 on STN
LOCUS (LOC):
                       AX537507
                                    GenBank (R)
GenBank ACC. NO. (GBN): AX537507
GenBank VERSION (VER): AX537507.1 GI:25269333
CAS REGISTRY NO. (RN): 493300-22-4
SEQUENCE LENGTH (SQL): 1755
MOLECULE TYPE (CI):
                       DNA; linear
DIVISION CODE (CI):
                       Patent
DATE (DATE):
                       23 Nov 2002
DEFINITION (DEF):
                       Sequence 3 from Patent EP1241260.
SOURCE:
                       Homo sapiens (human)
ORGANISM (ORGN):
                       Homo sapiens
                       Eukaryota; Metazoa; Chordata; Craniata; Vertebrata;
                       Euteleostomi; Mammalia; Eutheria; Primates; Catarrhini;
                       Hominidae; Homo
NUCLEIC ACID COUNT (NA): 291 a 538 c
                                        484 g
                                                442 t
REFERENCE:
                       1
  AUTHOR (AU):
                       Curtis, R.A.
  TITLE (TI):
                       69318, a ***human***
                                                  ***sodium*** /
                         ***calcium*** ***exchanger***
                                                            (transporter
                       protein) and uses therefor
   JOURNAL (SO):
                       Patent: EP 1241260-A 3 18-SEP-2002; MILLENIUM
                       PHARMACEUTICALS, INC. (US)
FEATURES (FEAT):
 Feature Key
                                           Qualifier
                   Location
source
               1..1755
                                       /organism="Homo sapiens"
                                       /db-xref="taxon:9606"
CDS
               1..1755
                                       /note="unnamed protein product"
                                       /codon-start=1
                                       /protein-id="CAD57495.1"
                                       /db-xref="GI:25269334"
                                       /translation="MAGRRLNLRWALSVLCVLLM
                                       AETVSGTRGSSTGAHISPQFPASG
                                       VNQTPVVDCRKVCGLNVSDRCDFIRTNPDCHSDG
                                       GYLDYLEGIFCHFPPSLLPLAVTL
                                       YVSWLLYLFLILGVTAAKFFCPNLSAISTTLKLS
                                       HNVAGVTFLAFGNGAPDIFSALVA
                                       FSDPHTAGLALGALFGAGVLVTTVVAGGITILHP
                                       FMAASRPFFRDIVFYMVAVFLTFL
                                       MLFRGRVTLAWALGYLGLYVFYVVTVILCTWIYQ
                                       RQRRGSLFCPMPVTPEILSDSEED
                                       {\tt RVSSNTNSYDYGDEYRPLFFYQETTAQILVRALN}
```

PΤ

EP 1241260 A1 20020918

PLDYMKWRRKSAYWKALKVFKLPV
EFLLLLTVPVVDPDKDDQNWKRPLNCLHLVISPL
VVVLTLQSGTYGVYEIGGLVPVWV
VVVIAGTALASVTFFATSDSQPPRLHWLFAFLGF
LTSALWINAAATEVVNILRSLGVV
FRLSNTVLGLTLLAWGNSIGDAFSDFTLARQGYP
RMAFSACFGGIIFNILVGVGLGCL
LQISRSHTEVKLEPDGLLVWVLAGALGLSLVFSL
VSVPLQCFQLSRVYGFCLLLFYLN
FLVVALLTEFGVIHLKSM"

```
SEQUENCE (SEQ):
     1 atggccggca gaaggctgaa tctgcgctgg gcactgagtg tgctttgtgt gctgctaatg
    61 gcggagacag tgtctgggac taggggctcg tctacaggag ctcacattaq cccccaqttt
   121 ccagcttcag gtgtgaacca gacccccgtg gtagactgcc gcaaggtgtg tggcctgaat
   181 gtctctgacc gctgtgactt catccggacc aaccctgact gccacagtga tggggggtac
   241 ctggactacc tggaaggcat cttctgccac ttccctccca gcctcctccc tctggctgtc
   301 actetetacg titeetgget getetacetg titetgatte tgggagteae egeageeaag
   361 tttttctgcc ccaacttgtc ggccatttct accacactga agctctccca caacgtggca
   421 ggcgtcacct tcctggcatt tgggaatggt gcacctgaca tcttcagtgc cctggtggcc
   481 ttctctgacc cgcacacagc cggcctggcc cttggggcac tgtttggcgc tggcgtgctg
   541 gttaccacag tggtggccgg aggcattacc atcctacacc ccttcatggc tgcctccagg
   601 cccttcttca gggacatcgt tttctacatg gtggctgtgt tcctgacctt cctcatgctc
   661 ttccgtggca gggtcaccct ggcatgggct ctgggttacc tgggcttgta tgtgttctat
   721 gtggtcactg tgattctctg cacctggatc taccaacggc aacggagagg atctctgttc
   781 tgccccatgc cagttactcc agagatcctc tcagactccg aggaggaccg ggtatcttct
   841 aataccaaca gctatgacta cggtgatgag taccggccgc tgttcttcta ccaggagacc
   901 acggctcaga tcctggtccg ggccctcaat cccctggatt acatgaagtg gagaaggaaa
   961 tcagcatact ggaaagccct caaggtgttc aagctgcctg tggagttcct gctgctcctc
  1021 acagtccccg tcgtggaccc ggacaaggat gaccagaact ggaaacggcc cctcaactgt
  1081 ctgcatctgg ttatcagccc cctggttgtg gtcctgaccc tgcagtcggg gacctatggt
  1141 gtctatgaga taggcggcct cgttcccgtc tgggtcgtgg tggtgatcgc aggcacagcc
  1201 ttggcttcag tgaccttttt tgccacatct gacagccagc cccccaggct tcactggctc
  1261 tttgctttcc tgggctttct gaccagcgcc ctgtggatca acgcggccgc cacagaggtg
  1321 gtgaacatct tgcggtccct gggtgtggtc ttccggctga gcaacactgt gctggggctc
  1381 acgctgctgg cctgggggaa cagcattgga gatgccttct cggatttcac actggctcgc
  1441 cagggetace caeggatgge gtteteegee tgetttggeg geateatett caacateete
  1501 gtgggtgtgg ggctgggctg cctgctccag atctcccgaa gccacacaga agtgaagctg
  1561 gagccagacg gactgctggt gtgggtcctg gcaggcgccc tggggctcag cctcgtcttc
  1621 tecetggtet cagteceatt geagtgette cageteagea gagtetatgg ettetgeetg
  1681 ctcctcttct acctgaactt ccttgtcgtg gccctcctca ctgaatttgg agtgattcac
  1741 ctgaaaagca tgtga
    ANSWER 25 OF 26
L2
                         GENBANK.RTM. COPYRIGHT 2005 on STN
LOCUS (LOC):
                       AX537505
                                    GenBank (R)
GenBank ACC. NO. (GBN): AX537505
GenBank VERSION (VER): AX537505.1 GI:25269330
CAS REGISTRY NO. (RN): 493300-21-3
SEQUENCE LENGTH (SQL): 2875
MOLECULE TYPE (CI):
                       DNA; linear
DIVISION CODE (CI):
                       Patent
DATE (DATE):
                       23 Nov 2002
DEFINITION (DEF):
                       Sequence 1 from Patent EP1241260.
SOURCE:
                       Homo sapiens (human)
ORGANISM (ORGN):
                       Homo sapiens
                       Eukaryota; Metazoa; Chordata; Craniata; Vertebrata;
                       Euteleostomi; Mammalia; Eutheria; Primates; Catarrhini;
                       Hominidae; Homo
NUCLEIC ACID COUNT (NA): 525 a 868 c
                                        810 q
                                                672 t
REFERENCE:
  AUTHOR (AU):
                       Curtis, R.A.
  TITLE (TI):
                       69318, a ***human***
                                                 ***sodium*** /
                        ***calcium*** ***exchanger*** (transporter
                       protein) and uses therefor
  JOURNAL (SO):
                       Patent: EP 1241260-A 1 18-SEP-2002; MILLENIUM
                       PHARMACEUTICALS, INC. (US)
FEATURES (FEAT):
 Feature Key
                 Location
                                          Qualifier
```

/organism="Homo sapiens"

1..2875

source

/db-xref="taxon:9606" /note="unnamed protein product" /codon-start=1 /protein-id="CAD57494.1" /db-xref="GI:25269331" /translation="MAGRRLNLRWALSVLCVLLM AETVSGTRGSSTGAHISPOFPASG VNOTPVVDCRKVCGLNVSDRCDFIRTNPDCHSDG GYLDYLEGIFCHFPPSLLPLAVTL YVSWLLYLFLILGVTAAKFFCPNLSAISTTLKLS HNVAGVTFLAFGNGAPDIFSALVA FSDPHTAGLALGALFGAGVLVTTVVAGGITILHP **FMAASRPFFRDIVFYMVAVFLTFL** MLFRGRVTLAWALGYLGLYVFYVVTVILCTWIYO RQRRGSLFCPMPVTPEILSDSEED RVSSNTNSYDYGDEYRPLFFYQETTAQILVRALN PLDYMKWRRKSAYWKALKVFKLPV **EFLLLLTVPVVDPDKDDQNWKRPLNCLHLVISPL** VVVLTLQSGTYGVYEIGGLVPVWV VVVIAGTALASVTFFATSDSOPPRLHWLFAFLGF LTSALWINAAATEVVNILRSLGVV FRLSNTVLGLTLLAWGNS IGDAFSDFTLAROGYP RMAFSACFGGIIFNILVGVGLGCL LOISRSHTEVKLEPDGLLVWVLAGALGLSLVFSL VSVPLQCFQLSRVYGFCLLLFYLN

FLVVALLTEFGVIHLKSM"

SEQUENCE (SEQ):

```
1 atgttgtccc cctttctcac tcccaccttg caggccaccg gagccgccag ctgttggaac
  61 tgagctactg cagaaaggga agtggagagt aagggccagg ccccgtgggg gcagatggcc
 121 ggcagaaggc tgaatctgcg ctgggcactg agtgtgcttt gtgtgctgct aatggcggag
 181 acagtgtctg ggactagggg ctcgtctaca ggagctcaca ttagccccca gtttccagct
 241 tcaggtgtga accagacccc cgtggtagac tgccgcaagg tgtgtggcct gaatgtctct
 301 gaccgctgtg acttcatccg gaccaaccct gactgccaca gtgatggggg gtacctggac
 361 tacctggaag gcatcttctg ccacttccct cccagcctcc tccctctggc tgtcactctc
 421 tacgtttcct ggctgctcta cctgtttctg attctgggag tcaccgcagc caagtttttc
 481 tgccccaact tgtcggccat ttctaccaca ctgaagctct cccacaacgt ggcaggcgtc
 541 accttcctgg catttgggaa tggtgcacct gacatcttca gtgccctggt ggccttctct
 601 gaccegeaca cageeggeet ggeeettggg geactgtttg gegetggegt getggttace
 661 acagtggtgg ccggaggcat taccatecta cacceettea tggetgeete caggeeette
 721 ttcagggaca tcgttttcta catggtggct gtgttcctga ccttcctcat gctcttccgt
 781 ggcagggtca ccctggcatg ggctctgggt tacctgggct tgtatgtgtt ctatgtggtc
 841 actgtgattc tctgcacctg gatctaccaa cggcaacgga gaggatctct gttctgcccc
 901 atgccagtta ctccagagat cctctcagac tccgaggagg accgggtatc ttctaatacc
 961 aacagctatg actacggtga tgagtaccgg ccgctgttct tctaccagga gaccacggct
1021 cagatectgg teegggeeet caateceetg gattacatga agtggagaag gaaateagea
1081 tactggaaag ccctcaaggt gttcaagctg cctgtggagt tcctgctgct cctcacagtc
1141 cccgtcgtgg acccggacaa ggatgaccag aactggaaac ggcccctcaa ctgtctgcat
1201 ctggttatca gccccctggt tgtggtcctg accctgcagt cggggaccta tggtgtctat
1261 gagataggcg gcctcgttcc cgtctgggtc gtggtggtga tcgcaggcac agccttggct
1321 tcagtgacct tttttgccac atctgacagc cagccccca ggcttcactg gctctttgct
1381 ttcctgggct ttctgaccag cgccctgtgg atcaacgcgg ccgccacaga ggtggtgaac
1441 atcttgcggt ccctgggtgt ggtcttccgg ctgagcaaca ctgtgctggg gctcacgctg
1501 ctggcctggg ggaacagcat tggagatgcc ttctcggatt tcacactggc tcgccagggc
1561 tacccacgga tggcgttctc cgcctgcttt ggcggcatca tcttcaacat cctcgtgggt
1621 gtggggctgg gctgcctgct ccagatctcc cgaagccaca cagaagtgaa gctggagcca
1681 gacggactgc tggtgtgggt cctggcaggc gccctggggc tcagcctcgt cttctccctg
1741 gtctcagtcc cattgcagtg cttccagctc agcagagtct atggcttctg cctgctcctc
1801 ttctacctga acttccttgt cgtggccctc ctcactgaat ttggagtgat tcacctgaaa
1861 agcatgtgac tgaagccgct tagtgctgtg gcctcactgc aggcaggagc cccgccctc
1921 ctgccggggg aggcccaggg accggagcat ttctgcaagg cccttgtggg cacgagagtg
1981 cggcccttgc tgctggagat ctgaggtcac tgctgtgagc tgggagaact gctgtgtacc
2041 tettgetgee ageaceeaac ageettgeeg tggggaeett ggaaacetgg etttgetetg
2101 gacaaagggt tccagagaga agctagaagt ccccttgaa tgacccccag agcccctctg
2161 agaagggctg gagtttgggg gaaggggatg gctggatgtg ctccaggcca tgctggaggt
2221 acccccgagg cacaggcact gcccgttccc cttgcctggg cttcaggcct tctggcacct
2281 tetcaggaca caagtggetg eccaaceetg acteagagaa tgagggtgge ttggaceeet
2341 gggaatcagg ccgccgaggg ctgagctcca gagccgcacc atctgccaca aacagaattc
2401 gagacatact taattttgaa tttctccttg ccacgttaat aaagccaaaa gcagcgggtg
2461 ctattcgtgg caacacactt cactgaaccc acttgcttcc aaaacgatgc cagcccgagg
2521 cactgctacg ccagcagctg ccacatggga tggtggctca ggcgctccct ccaggattct
2581 geceetgeet gtecacagae teetttgtge tggaacetgg geteeteeag etgecaggea
```

```
2641 ggagteggta ggaetgtgee tgtgeeteee teagegggge cetgggeggg gtteeaaqqe
  2701 ctgcgagctg ggaaaggaca gatgagggga cctcgtgcct tcttgctgtc atqcaatqac
  2761 cccgccttat gttgccgaaa taagcaactc ttaqqtttgc ctgactgcct tatqctqqta
  2821 aagaaaaggg attcaactgt ctcttttcca aataaaaaaa aaagtcaaaa tttca
     ANSWER 26 OF 26
                          GENBANK.RTM. COPYRIGHT 2005 on STN
LOCUS (LOC):
                        HSU83657
                                    GenBank (R)
GenBank ACC. NO. (GBN): U83657
GenBank VERSION (VER): U83657.1 GI:1800289
CAS REGISTRY NO. (RN): 185770-06-3
SEQUENCE LENGTH (SQL): 2471
MOLECULE TYPE (CI): DNA; linear DIVISION CODE (CI): Primates DATE (DATE): 27 Jan 1997 DEFINITION (DEF): ***Human**
                        ***Human***
                                          ***exchanger*** 1 (NCX1) gene, intron 4, complete
                        sequence.
SOURCE:
                        human.
 ORGANISM (ORGN):
                        Homo sapiens
                        Eukaryota; Metazoa; Chordata; Craniata; Vertebrata;
                        Euteleostomi; Mammalia; Eutheria; Primates; Catarrhini;
                        Hominidae; Homo
NUCLEIC ACID COUNT (NA): 828 a 464 c
  FERENCE: 1 (bases 1 to 2471)

AUTHOR (AU): Halushka, M.; Solinsky, K.; Chakravarti, A.

TITLE (TI): Sodium calcium exchanger 1 (NCX1) intron 4

JOURNAL (SO): Unpublished
                                          392 g
                                                 787 t
REFERENCE:
  AUTHOR (AU):

AUTHOR (AU):

TITLE (TI):

Direct Submission

JOURNAL (SO):

Submitted (02-72):
REFERENCE:
                        Submitted (03-JAN-1997) Department of Genetics, Case
                        Western Reserve University, 2109 Adelbert Road,
                        Cleveland, OH 44106, USA
FEATURES (FEAT):
                  Location
 Feature Key
                                             Qualifier
source
               1..2471
                                         /organism="Homo sapiens"
                                         /db-xref="taxon:9606"
                                         /chromosome="2"
                                         /map="2p23-p21"
                1..2471
gene
                                         /gene="NCX1"
intron
                1..2471
                                         /gene="NCX1"
                                         /note="sodium calcium exchanger 1;
                                         SLC8A1"
                                         /number=4
SEQUENCE (SEQ):
     1 gtgtgagagt aaacaaagac ataccagcga gaaattgtac tettetetet ceatgtetee
    61 ctacteteae aettaaetet eteetettee teggetteea agtactatae tteattgeet
   121 ttgaagettt agcaatttea ttteeettee etaatteaca agtgeaacag geaacgeeca
   181 ctttcttcag gaaatgccaa ctaaccttga ttgcaaccag atttaataac actgaaaggg
   241 atttetgtaa tteagaaatg attacataaa agaatgtgtt tagtttttea etaeteaegg
   301 tttattctaa aatgtcactc caattattaa atcttcccta aaattttagt gataaagacg
   361 acttaatacc tcatcaatca tacctcaata aagctggaaa aaagaaactg cttaatacct
   421 attagtatta gtagatgacc ctaatggcaa ctaacaggaa acttcagaat tcaaataatt
   481 aggcttcttt ggagaacaca gtttaaaaat atttaataag aacaaagatc cttaaagagt
   541 agtattttca atattctagt gctcatttta gcatattttt tatatcatca aatacaacat
   601 ttaaaaggca ccatatctat gaaaccaaag cctacctagc tttatgctcc aaaatctctt
   661 gataattaca gaattagtaa attattaaca catataaaaa aagaaaaaat aaaagtagtg
   721 tcctttataa ctagattatg ccgattctgc tgattattaa tatatggcat atatttcata
   781 ggaaagacag caatcttgta tcagctttac agaggatttt ttattctgaa ttgttcatag
   841 ggcttcatat aattatcctc taatggtggc cattttaaaa ggaattctgg tgaattactt
   901 attgtgtaaa atgagcagac cacatattaa tagctcttat tagttgcata caaacaattg
  961 gtgagagcag tatgatataa tgagatgggc cactttgtaa gaaatttatg cttttacaag
  1021 tagagggaaa aataaaatat ataggactaa ttgctatgta gacacatagg aaaatttatc
  1081 ccacgttcat cccatgtttg tggcctcaca gtccgctggt ggggaaaaaa cacatatgtt
  1141 tctgtgttaa tcaagttcaa gatggagtat ttggagtatt tggagtgatg ggaaaaggag
  1201 cactcaaggc ctattttaat gaagcctatt taatatgctc catagatggt aqacagaaga
  1261 aaaagagacc agaaaattat gctgatttct taaaagatgg gatccaaaat gcctcattaa
```

1321 catacaggag aaagcacttt cttctcaatg tattcctcca aagaacttta tctcaaggag

L2

```
1381 gagcatcttg gattctgctc ttacaattqc cqttttagta aaatatqctc tcatqtaaca
1441 gcaaattaaa attoottaat agcactatoo agtttoacac cogcoaagtg gattottqto
1501 actattaata aattactgac tttttttaga aagtatcctc taatgccacc atcattagag
1561 agaaaactgg gcccaaaaaa gtaactgtaa cattcccgtc ttcaactcag gaaataattt
1621 gatatattta gcaaggttgc ttttactaaa ataaagtgct acagtacatt ctgggcttaa
1681 agcacataag ctgaaagaca aattatacgt ccccctcccc ccaacccaat gccctgtcag
1741 tttcctggga tgatatgtcc actagaagga ttctggttat ctaataacgt acagaagtca
1801 cagataagga cacaagtagg tgttaattcc tgggactatt aagctttaag gattttaaaa
1861 cataagcaat tottggtgga caaaatatca tocaaataga acatoocaag atagtgottt
1921 accttgggct aaactttctt tccaggcagg gaacccaaaa tggaatgtcc caggatgttt
1981 cacctgtact tactgaataa aaggtgtgat acctgagttc ctgggtgatt taagacttcc
2041 atatgttgga ttgaccaaat ccgaggcaat atttaatgag ggagcctcac tcatatcaag
2101 ttaagaatga atttcataca atgtttccac tgtatttggt aaactagatt tacataatag
2161 gtataaacat atatactagc aatgtcttat taaatgtaaa gaaattatat aaggtgaaat
2221 acatatacac acacacaca acacatatac gtatgtattc aatcacacac attttcagaa
2281 atttcagttg ggattgttta ttcagaaata ttcccatcac tatatttctt tggggtatac
2341 ccatttttag cagtggctcc ctaccactgt aatcagatct gcctggattt ctttctgctg
2401 atattcctct tactttcatt attcatctgg tctcttattc tgtgtttgtc tttgtctgtt
2461 tccttccaca g
```

STN INTERNATIONAL LOGOFF AT 16:42:57 ON 07 APR 2005